1704.

N° 2465
12

Apollo Anglicanus,

THE
ENGLISH APOLLO,

Aſſiſting
All Perſons in the Right Underſtanding of this Years Revolutions, as alſo of
Things paſt, preſent, and to come.

With neceſſary Tables, plain and uſeful.

A twofold Kalendar, *viz.* *Julian* or *Engliſh*; and *Gregorian* or *Foreign* Computations, more plain and full than any other, with the Riſing and Setting of the Sun, the nightly Riſing and Setting of the Moon, and alſo her Southing, exactly calculated for every Day. Of general Uſe for moſt Men.

Being *Biſſextile*, or *Leap-Year*.

To which is added the Moon's Application to the fixed Stars: With the Calculation of the Eclipſes: Alſo Rules and Tables for the meaſuring of Timber: With many other things both pleaſant, uſeful, and neceſſary.

Calculated according to Art, and fitted to the Meridian of *Leiceſter*, whoſe Latitude is 52 Degrees, 41 Minutes, exactly fitting all the middle Counties of *England*, and without ſenſible Error the whole Kingdom.

By *RICHARD SAUNDER*,
Student in the Phyſical and Mathematical Sciences.

LONDON, Printed by *J. Wilde*, for the
Company of *STATIONERS*, 1704.

The *Julian* or Old Account uſed in *Engl.*	1704.	The *Gregorian* or New Stile uſed beyond Sea.
14	The Golden Number.	14
B. A.	The Dominical Letters.	F. E
4	The Epact.	2
February 27	Shrove-Sunday.	March
May 25	Aſcenſion-Day.	May 29
June 4	Whit-Sunday.	June 8
December 3	Advent-Sunday.	November 30

A Table of the Terms and their Returns.

Hilary Term begins *January* 24, ends *February* 12.

Eſſoin-days.		*Except.*		*Ret. Brev.*		*Appear.*		
Octab. Hilar. Jan.	20	January	21	Jan.	22	Jan.	24	M
Quind. Hilar. Jan.	27	January	28	Jan.	29	Jan.	31	M
Craſtin. Puriſ. Feb.	3	February	4	Febr.	5	Febr.	7	M.
Octab. Puriſ. Feb.	9	February	10	Febr.	11	Febr.	12	S.

Eaſter Term begins *May* 3, ends *May* 29.

Quind. Paſch. May	1	May	2	May	2	May	3	W.
Tres Paſch. May	8	May	9	May	9	May	10	W.
Menſ. Paſch. May	15	May	16	May	16	May	17	W.
Quinq. Paſch. May	22	May	23	May	23	May	24	W.
Craſt. Aſcenſ. May	26	May	27	May	27	May	29	M.

Trinity Term begins *June* 16, ends *July* 5.

Craſt. Trin. June	12	June	13	June	14	June	16	F.
Octab. Trin. June	19	June	20	June	20	June	21	W.
Quind. Trin. June	26	June	27	June	27	June	28	W.
Tres. Trin. July	3	July	4	July	4	July	5	W.

Michaelmas Term begins *Octob.* 23, ends *Nov.* 28

Tres Mich. Octob.	20	Octob.	21	Octob.	21	Octob.	23	M.
Menſ. Mich. Octob.	27	Octob.	28	Octob.	28	Octob.	30	M.
Craſt. Anim. Nov.	3	Novemb.	4	Nov.	4	Nov.	6	M.
Craſt. Mart. Nov.	13	Novemb.	14	Nov.	14	Nov.	15	W.
Octab. Mart. Nov.	18	Novemb.	20	Nov.	20	Nov.	21	T.
Quind. Mart. Nov.	25	Novemb.	27	Nov.	27	Nov.	28	T.

A Table of the KINGS and QUEENS of *England*, ſince the Conqueſt.

	Born Anno	*Began to reign.*	Reigned Y.	M	Since their Reigns ended.	Buried at
William 1	1029	1066, Oct. 14	20	11	617, Septem. 9	Caen No.
William 2	1056	1087, Sep. 9	12	11	604, Auguſt 2	Wincheſt
Henry 1	1068	1100, Aug. 2	35	4	569, Decem. 1	Reding
Stephen	1105	1135, Dec. 1	18	11	550, Octob. 25	Feverſh.
The Saxon Line reſtor'd.						
Henry 2	1132	1154, Oct. 25	35	9	515, July 6	Fountever
Richard 1	1155	1189, July 6	9	9	505, April 6	Fountever
John	1165	1199, April 6	17	6	488, Octob. 19	Worceſt.
Henry 3	1207	1216, Oct. 19	56	1	32, Nov. 16	Weſtmin.
Edward 1	1239	1272, No. 16	34	8	397, July 7	Weſtmin.
Edward 2	1283	1307, July 7	19	7	3 8, Jan. 25	Gloceſter.
Edward 3	1312	1326, Jan. 25	51	5	327, June 21	Weſtmin.
Richard 2	1366	1377, Jun. 21	22	3	305, Sept. 29	Weſtmin.
The Line of Lancaſter.						
Henry 4	1367	1399, Sep. 29	13	6	291, Mar. 20	Canterb.
Henry 5	1386	1412, Mar. 20	9	5	282, Aug. 31	Weſtmin.
Henry 6	1421	1422, Aug. 31	38	6	243, Mar. 4	Windſor
The Line of York.						
Edward 4	1442	1461, Mar. 4	2	1	21, April 9	Wincheſt.
Edward 5	1471	1483, Apr. 9	0	1	21, June 18	Not kno.
Richard 3	1448	1483, Jun. 18	2	2	19, Aug. 2	Leiceſt.
The Families United.						
Henry 7	1455	1485, Aug. 22	23	8	195, April 22	Weſtmin.
Henry 8	1491	1509, Apr. 22	37	10	157, Jan. 28	Windſor
Edward 6	1537	1547, Jan. 28	6	5	151, July 6	Weſtmin.
Qu. Mary	1518	1553, June 6	5	4	146, Nov. 17	Weſtmin.
Qu. Elizab.	1533	1558, No. 17	44	4	102, March 24	Weſtmin.
The Union of the two Kingdoms.						
James 1	1566	1602, Ma. 24	22	5	79, March 27	Weſtmin.
Charles 1	1600	1625, Ma. 27	23	11	55, Janu. 30	Windſor
Charles 2	1630	1648, Jan. 30	36	0	19, Februar. 6	Weſtmin.
James 2	1633	1684, Feb. 6	4	0	15, Febru. 12	S. Germai.
William & Mary	1650 1662	1689, Feb. 13	13 5	1 10	2, March 8 10, Decemb. 28	Weſtmin Weſtmin.
Qu. Anne	1667	1702, Mar. 8	Whom God grant long to Reign.			

You here may ſee a Race of Monarchs Great,
Each for a time did fill the Royal Seat,
Then left the Throne : You ſee it fill'd again,
Pray God our Queen long time o'er us may reign,
Her Subjects multiply, Her Foes decreaſe,
Her Kingdom have Proſperity and Peace.

A Table ſhewing the time of the Moon's coming to the South in Hours and Minutes, every day for the firſt ſix Months of this Year 1704.

Days	*Jan.*		*February*		*March*		*April*		*May*		*June*	
	N.	M.	H.	M.	H.	M.	H.	M.	H.	M.	H.	M.
1	5A.	0	5A.	48	5A.	22	6A.	40	7A.	0	7A.	50
2	5	45	6	34	6	10	7	29	7	45	8	35
3	6	29	7	20	6	59	8	15	8	29	9	20
4	7	13	8	10	7	48	9	1	9	15	10	19
5	7	58	9	1	8	38	9	48	10	1	11	18
6	8	45	9	50	9	25	10	34	10	47	12	16
7	9	32	10	40	10	12	11	20	11	44	0M.	16
8	10	21	11	27	11	0	12	5	12	41	1	18
9	11	10	12	14	11	46	0M.	5	0M.	41	2	21
10	11	59	0M	14	12	32	0	58	1	38	3	24
11	12	48	0	59	0M.	32	1	51	2	39	4	16
12	0M.	48	1	44	1	17	2	45	3	40	5	8
13	1	33	2	28	2	7	3	45	4	41	6	1
14	2	19	3	13	2	57	4	46	5	34	6	46
15	3	2	4	2	3	47	5	47	6	27	7	30
16	3	45	4	52	4	46	6	42	7	21	8	14
17	4	27	5	49	5	44	7	37	8	7	9	2
18	5	10	6	46	6	43	8	32	8	53	9	50
19	6	2	7	43	7	41	9	20	9	38	10	38
20	6	54	8	44	8	39	10	8	10	25	11	28
21	7	53	9	45	9	38	10	55	11	12	12	18
22	8	52	10	46	10	28	11	41	11	58	1A.	8
23	9	56	11	39	11	18	12	27	12	50	1	54
24	11	0	12	32	12	9	1A.	13	1A.	42	2	40
25	12	1	1A	24	12	57	2	6	2	33	3	26
26	1A.	2	2	12	1A.	45	2	59	3	20	4	8
27	1	53	2	59	2	32	3	51	4	6	4	50
28	2	44	3	46	3	22	4	39	4	52	5	33
29	3	31	4	34	4	12	5	27	5	36	6	20
30	4	17			5	2	6	15	6	20	7	7
31	5	2			5	51			7	4		

A Table ſhewing the time of the Moon's coming to the South in Hours and Minutes, every day for the laſt ſix Months of this Year 1704.

Days	*July*		*Auguſt*		*Septem.*		*Octob.*		*Novem.*		*Decem.*	
	H.	M	H.	M.	H.	M.	H.	M.	H.	M.	H.	M.
1	7A.	53	9A.	35	11A.	32	11A.	59	0M.	21	0M.	35
2	8	52	10	38	12	24	12	50	1	13	1	26
3	9	52	11	40	0M.	24	0M.	50	2	4	2	18
4	10	51	12	42	1	16	1	40	2	56	3	9
5	11	55	0M.	42	2	8	2	30	3	48	3	55
6	12	59	1	34	2	56	3	20	4	39	4	39
7	0M.	59	2	26	3	44	4	12	5	24	5	22
8	2	2	3	18	4	32	5	4	6	9	6	2
9	2	55	4	6	5	22	5	56	6	54	6	42
10	3	47	4	54	6	13	6	44	7	36	7	21
11	4	39	5	42	7	4	7	31	8	18	8	10
12	5	24	6	32	7	54	8	18	9	0	8	58
13	6	9	7	21	8	43	9	1	9	47	9	46
14	6	54	8	10	9	32	9	44	10	33	10	45
15	7	42	9	0	10	16	10	27	11	19	11	47
16	8	30	9	51	10	57	11	13	12	17	12	49
17	9	17	10	42	11	42	11	58	1A.	15	1A.	49
18	10	6	11	26	12	26	12	43	2	14	2	48
19	10	55	12	10	1A.	11	1A.	39	3	14	3	48
20	11	43	12	54	1	56	2	34	4	14	4	39
21	12	31	1A.	37	2	48	3	29	5	14	5	27
22	1A.	19	2	20	3	40	4	29	6	4	6	15
23	2	7	3	3	4	32	5	18	6	54	7	2
24	2	50	3	52	5	32	6	28	7	44	7	49
25	3	32	4	41	6	32	7	21	8	31	8	36
26	4	14	5	30	7	32	8	13	9	17	9	26
27	5	2	6	30	8	29	9	6	10	3	10	17
28	5	49	7	31	9	25	9	54	10	54	11	8
29	6	35	8	32	10	21	10	42	11	44	11	57
30	7	32	9	32	11	10	11	30	12	35	12	47
31	8	31	10	32			12	21			0M.	47

To find the time of High Water in moſt Ports of England.

FIrſt ſeek the Moon's Southing on the foregoing Table for your Day, then you may conclude it High-Water at *Southampton*, *Quinborough* and *Portſmouth*, for there the South and North Moons make a High-Water: But when you deſire the time of Full Sea in any of the following Coaſts in the enſuing Table, find the name of the Place, and ſee how many Hours and Minutes be annex'd thereunto in the Column under *H. M.* which added to the time of the Moon's coming to the South, gives the time of High-Water at the Place required.

A *Tide Table*, with the Names of the Havens.

	H.	M.
Rocheſter, *Malden*, *Aberdeen*,	0	45
Graveſend, *Romney*, *Ramkins*,	1	30
London, *Tinmouth*, *Hartle-pool*,	3	0
Frith, *Leith*, *Dunbar*, *Narbon*,	4	30
Newcaſtle, *Falmouth*, *Humber*,	5	15
Lyn, *Antwerp*, *Plimouth*, *Hull*,	6	0
Briſtol, *Lanson*, *Foulneſs*,	6	45
Milford, *Bridg-water*, *North-coaſt*,	7	30
Portland, *Peterport*, *Hartflew*,	8	51
Dover, *Yarmouth*, *Harwich*, *Dublin*,	10	30
Calais, *Rye*, *Winchelſea*, *Calſhot*,	11	15

Example.

The 13th. Day of *April*, this Year, it is Required to know the Time of High-Water at *London*: By the Table of the Moon's coming to the South, againſt the 13th. of *April*. I find the Moon South at 3 ho. 45 min. in the Morning, then in the Tide-Table above, I find againſt *London*, 3 ho. 00 min. which being added to 3 ho. 45 min. makes 6 ho. 45 min. the Time of High-Water at *London*, *April* the 13th. In the Morning, ſo of any other.

Note, That the Tide floweth conſiderably more at the New and Full Moons, than at the Firſt and Laſt Quarter, as alſo the Latitude of the Moon and Winds may alter it an hour ſooner or later. *Directi-*

Directions for the ſubſequent Diary or Almanack.

IN the firſt Column to the left hand, on the left-hand Page you have the Numerical Figures of the days of the Month.

In the ſecond Column you have the week days, and the Dominical Letter.

In the third Column you have the Saints days, and the places of the Planets once a Month; as alſo the Moons application to the fixed Stars, by which the Aſteriſms and Conſtellations may be eaſily known to an ingenious eye and underſtanding.

In the fourth Column the Moons place in the Zodiack, every day at noon.

In the fifth Column the riſing and ſetting of the Moon, with reſpect to her Latitude.

In the ſixth Column the Mutual Aſpects of the Planets, with the general ſtate of the Weather.

In the firſt Column on the Right-hand Page you have the Engliſh Account.

In the ſecond Column you have the Roman Account, being now 1 days before ours.

In the third Column the Roman Week days.

In the fourth Column the perfect Roman Kalendar, and Saints days.

In the fifth Column you have a diſcourſe of the Ebbing and Flowing of the Sea, and the Cauſe thereof.

The ſixth, ſeventh and eighth Columns, the utmoſt to the Right hand, ſhew you the daily Riſing and Setting of the Sun.

On the top of the Left hand Page is ſet the New and Full Moons, with the firſt and laſt Quarters.

On the top of the Right hand Page is ſet the Riſing, Southing and Setting of the Planets.

January hath xxxi days.

☽ Firſt Quarter the 2d. day, at 11 at night.
● Full Moon the 11th. day, at 2 in the morning.
☾ Laſt Quarter the 18th. day, at 9 at night.
● New Moon the 25h. day, at 1 in the afternoon.

1	a	New-Years-day.	aries	4	11	A.07	
2	B	2 Sund. paſt Chr.	aries	17	12	22	
3	c	☽ n.Lu.inCa. ♈	taur.	0	0	M.22	Moon's Setting.
4	d	☽ n.Caud.Ariet.	taur.	13	1	36	
5	e	☽ n. Pleiades	taur.	25	2	47	
6	f	Epiphany.	gem.	7	3	58	
7	g	☽ n.Dex.ped. A.	gem.	19	5	03	
8	a	☽ n.Luc. Ped. ♊	canc.	0	6	08	
9	B	1 Sund. paſt Epi.	canc.	12	7	00	
10	c	Sol in Aquarius	canc.	24	7	49	
11	d	☽ n. Aſellos.	leo	6	Full	●	
12	e	☽ n.Cor. Leonis	leo	18	5	A.33	
13	f	☽ n.in Lu.Te.♌	virgo	0	6	44	
14	g	☽ n.Cau. Leonis	virgo	13	7	55	Moon's Riſing.
15	a	☽ n.Sin.Ala. vir.	virgo	25	9	09	
16	B	2 Sund. paſt Epi.	libra	8	10	23	
17	c	♄ ♈ 17.	libra	21	11	38	
18	d	♃ ♉ 12.	ſcorp.	4	12	54	
19	e	♂ ♐ 14.	ſcorp.	17	0	M.54	
20	f	♀ ♐ 24.	ſagit.	1	2	16	
21	g	Agnes	ſagit.	16	3	39	
22	a	☿ ♒ 26.	capri.	0	4	55	
23	B	3 Sund. paſt Epi.	capri.	15	0	11	
24	c	Term begins	aqua.	0	7	11	
25	d	Conver. S. Paul	aqua.	15	New	●	
26	e	☽ n. Dex. Hu. ♒	piſces	0	5	A.54	Moon's Setting.
27	f	☽ n.Marchab	piſces	15	7	16	
28	g	☽ n Algenib	piſces	29	8	37	
29	a	☽ n. Vent. Cet.	aries	13	9	55	
30	B	K. Char. I. Mart.	aries	26	11	13	
31	c	☽ n. Menker	taur.	9	12	26	

Windy, with ♂ ☉ ☿ cold Rain or Snow at the beginning is expected, and Froſts follow; then cloſe and foggy for ſome days, with light Froſts, and about the 10 or 11 driſling moiſt and raw △ ♄ ♀ □ ♃ ☿ Weather; now ſome hoar Froſts are expected, and □ ♄ ☿ followed with high Winds, and ſtormy Weather, which bring □ ☉ ♃ ✶ ♀ ☿ cold Rain or Snow, & continues ſtormy rough and △ ♄ ♂ bluſtering Weather; ✶ ☉ ♄ but towards the end more mild, yet ✶ ☉ ♂ moiſt Weather:

January 1704

Saturn is South between 4 and 5 at Night, and ſets about 11. *Jupiter* is South about 6 at Night, and ſets betweeen 1 and 2 in the Morning: *Mars* and *Venus* riſe between 4 and 5 in the Morning. *Mercury* at the beginning is Combuſt, but at the end he ſets after the Sun about 2 hours, and may therefore be ſeen.

Of the Tides, or Ebbing and Flowing of the Sea.

Having in ſeveral of my late Almanacks treated of the Motion of the Earth, I ſhall now come to that which doth moſt apparently depend thereon, and is cauſed thereby; and that is the Ebbing and Flowing of the Sea. Of the Ebbing and Flowing of the Sea, there hath been, and are to this day, various Opinions. That the Moon is the cauſe thereof, hath been the Opinion of many, but they differ in the manner of her effecting it; ſome ſay, That by her temperate Heat ratifying the Waters, ſhe doth cauſe them to ſwell and by their being condenſed again they fall; others, that the Moon attracteth, and draweth towards her ſelf a great maſs of Water, which thereby followeth her: others that by preſſure ſhe driveth them. Mr. Woodward *in his Eſſay towards a Natural Hiſtory of the Earth, tells us, He ſhall add ſomething touching the Ebbing and Flowing of*

English Accompt.	Forein Accompt.	Roman Kalendar.	Roman Saints days					
1	12	e	Satyrius	1	8	7	3	53
2	13	f	1 Sun.p.Epi.	2		6		54
3	14	g	Felix	3		4		56
4	15	a	Mauritius	4		2		58
5	16	b	Marcellus	5		1	3	59
6	17	c	Anthony	6	7	59	4	1
7	18	d	Priſca	7		58		2
8	19	e	Pontian	8		56		4
9	20	f	2 Sun.p.Epi.	9		55		[illegible]
10	21	g	Agneta	10		53		7
11	22	a	Vincent	11		52		8
12	23	b	Emerent	12	7	50	4	10
13	24	c	Timothy	13		49		11
14	25	d	Con. S.Paul	14		47		13
15	26	e	Polycarp	15	7	46		14
16	27	f	3 Sun.p.Epi.	16		44		16
17	28	g	Car. Mag.	17		43		17
18	29	a	Valerius	18		41		19
19	30	b	Adelgund.	19		39		21
20	31	c	Cyriacus	20	7	38	4	22
21	Febr.		Bridget	21		36		24
22	2	e	Pur.V.Mary	22		34		26
23	3	f	4 Sun.p.Epi.	23		33		27
24	4	g	Veronica.	24		31		29
25	5	a	Agatha	25	7	29	4	31
26	6	b	Dorothea	26		27		33
27	7	c	Zachary	27		25		35
28	8	d	Corinthia	28		23		37
29	9	e	Apollon.	29		21		39
30	10	f	5 Sun.p.Epi.	30	7	19	4	41
31	11	g	Euphroſin.	31		17		43

February hath xxix Days.

☽ First Quarter, the 1ſt. day, at 4 in the afternoon.
Full Moon the 9th. day, at 8 at night.
☾ Laſt Quarter, the 1 th. day, at 7 in the morning.
New Moon the 23d. day, at 11 at night.

Mon. Da.	Week Da.	Feſtival & Saints days, with the ☽'s applicatio. to the noted fix'd ſtars.	The ☽ place in zodiack at Noon		The ☽'s riſing fro. the full to the change, & ſetting fr. the cha. to the F.			The mutu. Aſ. of the Plan. with the var. con. of air, & cha. of wea.
1	d	☽ n. Pleiades.	taur.	21	0 M.	26	Moon's Setting.	Fair and froſty
2	e	Purif. V. Mary	Gem	3	1	39		at the beginning
3	f	☽ n. Alhaiot.	Gem.	15	2	4		and is expected
4	g	☽ n.dex. hu. Au.	Gem.	27	3	56		⚹ ♃ ☿ ſo for
5	a	☽ n Caſt.& Pol.	Can.	9	4	50		ſome days; then
6	B	5 Sun. paſt Epiph.	Can.	21	5	44		follow Winds,
7	c	☽ n. Aſellos.	leo	3	6	20		△ ♃ ♀ and
8	d	Sol in Piſces.	leo	15	6	56		⚹ ♀ ☿ about
9	e	☽ n Cor.Leonis.	leo	27	Full ○			the 9th. or 10th.
10	f	☽ n.Ter.Leonis.	virgo	9	5 A.	43		day, cold driſ
11	g	☽ n.Caud.Leon.	virgo	22	6	57		⚹ ♃ ☿ ling
12	a	Term ends.	libra	5	8	11		□ ♄ ☿ Rain,
13	B	Septuageſima.	libra	18	9	27		or Snow, then
14	c	*Valentine.*	ſcorp.	1	10	44	Moon's Riſing.	ſome light Froſts
15	d	☽ n.LanxBoreal.	ſcorp	14	12	04		follow, and a
16	e	☽ n. Cor.Scorpi.	ſcorp.	28	0 M.	04		bout the 16th.
17	f	♄ ♈ 20.	ſagit.	12	1	24		☌ ☉ ☿ or 1 th.
18	g	♃ ♉ 16.	ſagit.	26	2	4		ſome ſtormy
19	a	♂ ♑ 5.	capr.	10	4	00		Weather, is ex-
20	B	Sexageſima.	capr.	25	4	56		□ ♂ ☿ pected,
21	c	♀ ♑ 28.	aquar.	9	5	51		ſollowed with
22	d	☿ ♓ 6. R.	aquar.	24	6	21		cold raw Miſts,
23	e	☽ n. Marchab.	piſces	9	New ●			or driſling Rain;
24	f	S. Matthias.	piſces	23	6 A.	15	Moon's Setting.	⚹ ♃ ☉ now
25	f	☽ n. Algenib.	aries	7	7	34		ſome Froſts, and
26	g	☽ n. Pri. ⚹ Ari.	aries	21	8	53		alſo cold and
27	A	Quinquageſima.	taur.	4	10	11		high Winds
28	b	☽ n.Pheiades.	taur.	17	11	29		bringing Snow,
29	c	Shrove-Tueſday	taur.	29	12	39		or cold Rain.

February 1704.

Saturn at the beginning ſets a little before 10, at the end he ſets a little after 8 at night. *Jupiter* at the beginning ſets about 12, at the end about 11 at night. *Mars* riſes about 4, and *Venus* about 5 in the morning. *Mercury* at the beginning may be ſeen to ſet after the Sun, in the middle he is hid under the Sun Beams, going to Combuſtion.

Engliſh Accom.	Forei. Accompt.	Rom. Kalenda.	Rom. Sts. Days.	Of the Tides, or Ebbing and Flowing of the Sea.	M.D	☾ ri.		☉ ſe.	
1	12	a	Euſrace	*of the Sea,* &c. *but that we*	1	7	16	4	44
2	13	b	Euſtatius	*are yet in expectation to ſee.*	2		14		46
3	14	c	Valentine	*But Mr.* Robinſon *in his Ob-*	3		12		48
4	15	d	Fauſtin	*ſervations on the Natural Hi-*	4		10		50
5	16	e	Juliana	*ſtory,* &c. *Says,* The Flux	5		8		52
6	17	F	Septuageſi.	and Reflux of the Sea is	6		6		54
7	18	g	Concordia	occaſioned by the continu-	7		4		56
8	19	a	Romin.	al Strife betwixt the freſh	8		2	4	58
9	20	b	Mildred.	Water and the Salt; *others*	9	7	0	5	00
10	21	c	Eſaias	*are of Opinion, that the eb-*	10	6	58		2
11	22	d	Cath. Pet.	*bing and flowing proceed*	11		56		4
12	23	e	Serenus	*from the different Profundi-*	12		54		6
13	24	F	Sexageſima	*ties of the Seas; theſe and*	13		52		8
14	25	f	S. Mathias	*many other Opinions ſeem*	14		50		10
15	26	g	Simeon	*ſtill to be far from the grand*	15		48		12
16	27	a	Neſtor	*and primary Cauſe of this*	16		46		14
17	28	c	Roman	*Ebbing and Flowing: The*	17	6	44	5	16
18	29	b	Fortuna	*different Profundities of the*	18		42		18
19	Marc.		David	*Sea and the Moon in ſome*	19		40		20
20	2	C	Quinquag.	*Caſes, are Cauſes of the dif-*	20		38		22
21	3	f	Cunegund	*ferent Returns and Recipro-*	21		36		24
22	4	g	Shrove-Tu	*cations of the Waters, but*	22		34		26
23	5	a	Aſh-Wedn	*not the prime Cauſe of their*	23	6	32	5	28
24	6	b	Frodelin	*Motion. For, firſt, to the*	24		30		30
25	7	c	Perpetua	*Moon's being the Cauſe, it*	25		27		33
26	8	d	Cyprian	*may as truly and properly be*	26		25		35
27	9	E	Quadrage	*ſaid, that the Waters thus*	27		23		37
28	10	f	Azapite	*moved, are the Cauſe of the*	28	6	21	5	39
29	11	g	Olwin	*Moon's Motion, as ſhe of*	29	6	19	5	41
				theirs;					

March hath xxxi days.

☽ Firſt Quarter the 1ſt. day, at 1 in the afternoon.
● Full Moon the 10th. day, a little before noon.
☾ Laſt Quarter the 17th. day, at 3 in the afternoon.
● New Moon the 24th. day, at 11 in the morning.

1	d	Aſh-Wedneſday	gem.	12	10 M.	39	
2	e	Chad.	gem.	24	1	49	Moon's Setting.
3	f	☽ n.Luc. ped. ♊	canc.	5	2	48	
4	g	☽ n. Ca & Poll.	canc.	17	3	46	
5	A	Quadrageſima	canc.	29	4	25	
6	b	☽ n.Cap. Leonis	leo	11	5	3	
7	c	☽ n. Cor. Leon.	leo	23	5	26	
8	d	Ember-Week	virg.	5	5	49	
9	e	Sol in Aries	virg.	18	6	11	
10	f	☽ n. Vindemiat.	libra	1	Full	●	—
11	g	☽ n. Spica Virg.	libra	14	7 A.	18	
12	A	2 Sund. in Lent	libra	27	8	40	
13	b	☽ n. Lanx Auſt.	ſcorp.	11	10	02	
14	c	☽ n.Su. in Fr. ♍	ſcorp.	25	11	22	
15	d	☽ n.Cor.Scorpi.	ſagit.	9	12	42	Moon's Riſing.
16	e	☽ n.Dex.hu.Op.	ſagit.	22	0 M.	42	
17	f	☽ n. Pri.in C. ♐	capr.	6	1	53	
18	g	♄ ♈ 24.	capr.	21	3	03	
19	A	3 Sund. in Lent	aqua.	5	3	48	
20	b	♃ ♉ 21.	aqua.	19	4	33	
21	c	Benedict	piſces	3	4	55	
22	d	♂ ♑ 26.	piſces	17	5	17	
23	e	♀ ♓ 6.	aries	1	5	39	
24	f	☿ ♓ 18.	aries	15	New	●	—
25	g	Ann. B.V. Mary	aries	29	7 A.	58	Moon's Setting.
26	A	Mid-Lent Sund.	taur.	12	9	14	
27	b	☽ n. Pleiades	taur.	25	10	30	
28	c	☽ n. Aldebaran	gem.	7	11	40	
29	d	☽ n. Alhaiot	gem.	19	12	50	
30	e	☽ n. Luc.ped. ♊	canc.	1	0 M	50	
31	f	☽ n. Ca. & Poll.	canc.	13	1	42	

froſty Weather with ſome ſtorms of Hail, or cold Rain begins the Month, then follow high Winds with Snow or cold Rain, and □ ♃ ♀ continues rough and turbulent, and ✱ ♄ ♀ △ ♃ ♂ about the 14th. ſome black froſts with cold nipping Winds are expected and continues froſty and fair for ſome days and about this time cloudy and cloſe Weather; but about the 24th. windy and ſtormy Weather is expect ✱ ♃ ☿ ed to begin, and continues rough and turbulent to the end.

March 1704.

Saturn ſets between 7 and 8 at Night: *Jupiter* ſets about 10 at Night; *Mars* riſes between 3 and 4 in the Morning; *Venus* riſes between 4 and 5; *Mercury* riſes before the Sun but can ſcarcely be ſeen.

English Accom.	Forein. Accom	Rom. Kalendar.	Rom St. days						
1	12	a	Gregory	*theirs; for the Moon being*	1	6	17	5	43
2	13	b	Euphraſia	*an attendant of this Globe,*	2	6	15		45
3	14	c	Eutychus	*and confined thereto, and the*	3	6	12		48
4	15	d	Longinus	*Waters being part of this*	4		10		50
5	16	E	Reminiſc.	*Globe, by whoſe* **Motion** *the*	5		8		52
6	17	f	Gertrude	*Moon is turned, they have*	6		6		54
7	18	g	Edward R.	*hereby a ſhare in her Motion,*	7		4		56
8	19	a	Joſeph	*and that there is ſome Con-*	8		2	5	58
9	20	b	Cuthbert	*nexion between the Courſe of*	9	6	0	6	0
10	21	c	Benedict	*the* **Moon** *and the Tides; ari-*	10	5	58	6	2
11	22	d	Aphrodiſ.	*ſeth from this, that both the*	11		56		4
12	23	E	Oculi	*Moon and Waters are ſubject*	12		54		6
13	24	f	Quirinus	*to, and muſt obſerve ſuch Mo-*	13		52		8
14	25	g	An. B.V.M.	*tion, as is imparted to, or gi-*	14		50		10
15	26	a	Caſtulus	*ven them by the* **Motion** *of the*	15		48		12
16	27	b	Jo. Erem.	*Earth; and that the* **Moon** *is*	16		46		14
17	28	c	Gideon	*turned by the* **Motion** *of the*	17	5	44	6	16
18	29	d	Euſtach	*Earth, as the Satellits of* Ju-	18		42		18
19	30	E	Lætar	piter *by the Motion of their*	19		40		20
20	31	f	Balbina	*primary Planet, appears by*	20		38		22
21	April		Theodore	*her ſwift Motion in Perigæon,*	21		36		24
22	2	a	Mary Egy.	*and ſlow in Apogæon: Yet if*	22		34		26
23	3	b	Ulpian	*the Moon can be ſuppoſed to*	23		32		28
24	4	c	Ambroſe	*be the Cauſe of the prime Mo-*	24		30		30
25	5	d	Vincent	*tion of the Waters, how muſt*	25	5	28	6	32
26	6	E	Judica	*ſhe effect it, not by her tem-*	6		26		34
27	7	f	Egeſippus	*perate Heat, if ſo, what*	27		24		36
28	8	g	Dionyſius	*would the exceſſive Heat of*	28		22		38
29	9	a	Marcellus	*Sun perform at ſome certai*	29		20		41
30	10	b	Ezechiel	*Times? and if it be by the*	30		17	6	43
31	11	c	Leo Pa.	*Waters being thus rarified,*	31		15		45
				how		5			

April hath xxx Days.

☽ Firſt Quarter the 1ſt. day, at 6 in the morning.
● Full Moon the 8th. day, at midnight.
☾ Laſt Quarter, the 15th. day, at 9 at night.
● New Moon the 22th. day, at 11 at night.
☽ Firſt Quarter, the 30th. day, at 10 at night.

1	g	☽ n. Aſellus	canc.	25	2	M. 34	Moon's Setting.
2	A	5 Sund. in Lent	leo	7	3	12	
3	b	☽ n Cor. Leonis	leo	19	3	37	
4	c	☽ n. Lu. in T. ♌	virgo	1	4	01	
5	d	☽ n. Caud. Leon	virgo	14	4	25	
6	e	☽ n. Sin. Ala. ♍.	virgo	26	4	41	
7	f	☽ n. Vindemiat.	libra	10	4	57	
8	g	☽ n. Spica virg.	libra	23	Full	●	
9	A	Palm-Sunday	ſcorp.	7	7	A. 53	
10	b	Sol in Taurus.	ſcorp	21	9	16	
11	c	☽ n. Cor. Scorp	ſagit.	5	10	39	
12	d	☽ n. Dex. hu. Op	ſagit.	19	11	53	Moon's Riſing.
13	e	☽ n pri. in ca. ♐	capri.	3	1	07	
14	f	☽ n. ult. in C. ♐	capri.	17	1	M.07	
15	g	☽ n. Lu. in M ♒	aqua.	2	1	55	
16	A	Eaſter-Day	aqua.	16	2	42	
17	b	☽ n Dex. hu. ♒	aqua.	29	3	11	
18	c	♄ ♈ 27.	piſces	13	3	32	
19	d	♃ ♉ 28.	piſces	27	3	53	
20	e	♂ ♒ 16.	aries	11	4	08	
21	f	♀ ♈ 10.	aries	24	4	24	
22	g	☿ ♉ 8.	taur.	7	New	●	
23	A	Low-Sunday.	taur.	20	8	A. 24	
24	b	☽ n Aldebaran	Gem.	3	9	33	Moon's Setting.
25	c	S. Mark.	Gem.	15	10	42	
26	d	☽ n. Dex. hu. A	Gem.	28	11	40	
27	e	☽ n. Lu. ped. ♊	canc.	10	12	37	
28	f	☽ n. Caſt. & Pol.	canc.	22	0	M. 37	
29	g	☽ n. Aſellos	leo	3	1	10	
30	A	2 Sund. paſt E	leo	15	1	42	

dry Winds at the beginning, but about the 4th. ☌ ♄. ⊙ ✱ ♂ ♀ or 5th. ſome Showers of Rain, and alſo about ✱ ♃ ♀ the 9th or 10th. days ſhowry Weather is expected, then fair and pleaſant for ſome days, and about the 16th. or 17th. ☌ ♄ ☿. ſome warm Showers, and right *April*-Weather, & continues ſhowery, with ſome cold Winds, about this [*S. George*] time; but the ☌ ⊙ ☿ Weather is ſeaſonable, □ ♂ ☿ with frequent Showers to the end of the Month.

April 1704.

Saturn at the beginning is Combuſt and remains hid under the Sun Beams. *Jupiter* follows the Sun, and at the end ſets but a little after him: *Mars* riſes between 2 and 3 in the Morning; *Venus* riſes about 4 in the Morning; *Mercury* riſes at the beginning before the Sun; at the end he is Combuſt.

English Accom.	foreig. Accom.	Rom. Kalendar.	Rom. St. days						
1	12	d	Julius	*how comes it to paſs that*	1	5	13	6	47
2	13	E	Palm-Sund.	*Ships draw not much more*	2		11		49
3	14	f	Tiburtius	*Water at full Sea, than at low*	3		9		51
4	15	g	Perpetua	*Water? But the Heat of the*	4		7		53
5	16	a	Cariſius	*Moon is ſo very temperate,*	5		5		55
6	17	b	Anicetus	*if any at all, that the burning*	6		3		57
7	18	c	Valerian	*Speculum at* Lypſick, *that,*	7	5	1	6	59
8	19	d	Timon	*(by reflecting, and collecting*	8	4	59	7	1
9	20	E	Paſcha	*the Beams of the Sun) did*	9		57		3
10	21	f	Simeon	*Things almoſt incredible, as*	10		55		5
11	22	g	Quintin	*the melting of Crucibles, Pot-*	11		53		7
12	23	a	S. George	*ſheards, and Clods of Earth*	12		51		9
13	24	b	Albertus	*into Glaſs, yet by expoſing the*	13		49		11
14	25	c	S. Mark	*ſaid Speculum to the Beams of*	14		47		13
15	26	d	Cletus	*the Full Moon, no ſenſible*	15	4	45	7	15
16	27	E	Quaſimod.	*Heat or Warmth could be per-*	16		43		17
17	28	f	Vitalis	*ceived, neither can the Moon by her*	17		41		19
18	29	g	Pet. de Mil.	*attracting Vertue perform this*	18		40		20
19	30	a	Eutropius	*Work, in ſuch manner as is obſer-*	19		38		22
20	May.		S. Phi. & Jac	*ved: For altho' we deny not but that*	20		36		24
21	2	c	Athanaſius	*(as the Ingenious* Mr. Hook *hath*	21	4	35	7	25
22	3	d	Inv. Crucis	*hinted in his Attempt to prove the*	22		34		26
23	4	E	Miſericord	*Motion of the Earth) all Celeſtial*	23		33		27
24	5	f	Gothard	*Bodies whatſoever have an Attracti-*	24		31		29
25	6	g	Jo. Por. La.	*on or gravitating Power towards*	25		29		31
26	7	a	Juvenal	*their own Centers, whereby they*	26		27		33
27	8	b	Staniſlaus	*Attract, not only their own Parts,*	27		25		35
28	9	c	Epinach	*and keep them from flying from*	28		23		37
29	10	d	Gordi. &c.	*them, as we may obſerve the Earth*	29		21		39
30	11	E	Jubilate	*to do, but that they do alſo Attract*	30	4	19	7	41
				all the other Celeſtial Bodies that					
				are within the Sphere of their Acti-					
				vity; yet we ſhall with him Con-					
				clude, That thoſe attractive Powers,					

are

May hath xxxi Days.

● Full Moon the 8th. day, at 10 the morning.
☾ Laſt Quarter the 15th. day, at 2 in the morning.
● New Moon the 22th. day, at 1 in the afternoon.
☽ Firſt Quarter the 30th. day, at 4 in the afternoon.

1	b	S. Philip & Jacob	leo	27	2 M.	14	Moon's Setting.	fair and hot Wea-
2	c	☽ n. Lu. in ter. ♌	virgo	9	2	31		☌ ♃ ☿ ther be
3	d	Term begins	virgo	21	2	48		✱ ♂ ♀ gins the
4	e	☽ n, Vindemiat.	libra	4	3	05		Month, and about
5	f	☽ n. Spica Virg.	libra	17	3	19		the 5th. day ſome
6	g	☽ n. Lanx Auſt.	ſcorp.	1	3	33		☌ ♄ ♀ Showers
7	A	3 Sund. p. Eaſter	ſcorp.	15	3	46		are expected, and
8	b	☽ n. Cor. Scorp.	ſcorp.	29	Full ●		|	alſo about the
9	c	☽ n. Dex. Ge. Op	ſagit.	13	9 A.	40		Full Moon, with
10	d	Sol in Gemini	ſagit.	28	10	50		ſome brisk gales
11	e	☽ n. ult. in C. ♐	capri.	13	12	00		of Wind, other-
12	f	♄ ♉ 00. 00.	capri.	28	0 M.	00	Moon's Riſing.	whiles hot Wea-
13	g	♃ ♊ 3. 26.	aqua.	12	0	34		☌ ♃ ☉ ther, and
14	A	4 Sund. p. Eaſter	aqua.	26	1	08		about the 14th.
15	b	♂ ♓ 2.	piſces	10	1	42		ſome driſling
16	c	♀ ♉ 10.	piſces	24	2	00		Showers of Rain,
17	d	☿ ♊ 28.	aries	7	2	16		then fair and
18	e	☽ n. pri. ✱ Ari.	aries	20	2	32		warm Weather
19	f	☽ n. Lu. in C. ♈	taur.	3	2	49		✱ ♄ ☿ □ ♃ ♂
20	g	☽ n. Pleiades	taur.	16	3	05		with a Shower
21	A	5 Sund. p. Eaſter	taur.	29	3	21		upon the 18th. or
22	b	☽ n. Dex ped. A	gem.	11	New ●		—	19th; but the lat-
23	c	☽ n. Dex. hu. Au.	gem.	24	9 A.	31		ter part of the
24	d	☽ n. Luc. ped. ♊	canc.	6	10	22	Moon's Setting.	△ ♂ ☿ Month is
25	e	Aſcenſ. Domini	canc.	18	11	12		expected to be
26	f	☽ n. Aſellos	leo	0	11	44		for the moſt part
27	g	☽ n. Cor. Leon.	leo	12	12	15		windy and dry
28	A	6 Sund. p. Eaſter	leo	24	0 M.	15		except the 30 or
29	b	K. Cha. II. N. & R.	virgo	5	0	34		(Term ends) 31
30	c	☽ n. Caud. Leon.	virgo	17	0	52		days, which may pro-
31	d	☽ n. Vindemiat.	libra	0	1	10		bably produce ſome
								driſling Rain.

May, 1704

Saturn *riſes before the Sun.* Jupiter *goeth to Combuſtion, and continues hid under the Sun Beams.* Mars *riſes about* 1, *and* Venus *about [illegible] in the Morning.* Mercury *ſets after the Sun, and at the middle and latter end of the Month may be ſeen. He then not ſetting till* 10 *at Night.*

English Account	Forein Account	Rom. Kalendar	Romish Holydays						
1	12	[illegible]	Pancratius	are ſo much the more power-	1	4	17	7	43
2	13	[illegible]	Servatius	ful in Operating by how much	2		16		44
3	14	[illegible]	Boniface	nearer the Body wrought	3		14		46
4	15	[illegible]	Sophia	upon is to their own Centers;	4		12		48
5	16	[illegible]	Peregrin	the Waters ſuppoſed now	5		10		50
6	17	[illegible]	[illegible]	to be attracted, are not only	6		9		51
7	18	[illegible]	[illegible]	upon the Earth, but in the	7		8		52
8	19	[illegible]	[illegible]	Cavities thereof, as in Veſſels	8		6		54
9	20	[illegible]	Dunstan	containing them, and there-	9		5		[illegible]
10	21	[illegible]	[illegible]	fore not diſtant more than	10		3		[illegible]
11	22	[illegible]	[illegible]	one Semidiameter of the	11		2		[illegible]
12	23	[illegible]	Bonifacius	Earth from its Center, the	12		1	7	59
13	24	[illegible]	Esther	Moon is near 60 Semidia-	13		0	8	[illegible]
14	25	[illegible]	[illegible]	meters diſtant, the Earth is	14		59	8	[illegible]
15	26	[illegible]	Quadrat	alſo above 40 times as great	15		58		2
16	27	[illegible]	Beda V.	as the Moon, and if we ac-	16		57	8	3
17	28	[illegible]	German	count the attractive power	17		56		4
18	29	b	[illegible]	to be in proportion as the	18		54		6
19	30	c	Wigand	ſquare of their diſtances the	19		53		7
20	31	d	Petronil.	Moon muſt (if ſhe was of e-	20		52		8
21	[illegible]	e	[illegible]	qual Magnitude to the Earth)	21		51		9
22	2	f	Marcel.	attract theſe waters but as	22	3	50	8	10
23	3	g	Eraſmus	the Square of 1 to the Square	23		49		11
24	4	A	Petroch.	of 60, which is as 1 to 3600,	24		48		12
25	5	b	Boniface	but the Earth being 40 times	25		47		13
26	6	c	Artemius	as great as the Moon, if the	26		46		14
27	7	d	Paulus	force of the Attraction, or	27		45		15
28	8	[illegible]	Pentecoſt	gravitating Power in the	28		45		15
29	9	f	Barnim.	Celeſtial Bodies be propor-	29		44		16
30	10	g	Getulius	tional to the Quantity of	30	3	44	8	16
31	11	[illegible]	St. Barnab.	B mat-	[illegible]		43		15

June hath XXX Days.

○ Full Moon the 6th day at 6 in the afternoon
☾ Last Quarter the 13th day at 8 in the Morning.
● New Moon the 21st day at 3 in the morning.
☽ First Quarter the 29th day at 6 in the morning.

1	e	☽ n. Sin. Al. Vir.	libra	12	1 M	24	
2	f	☽ n. Spica Virg	libra	26	1	38	
3	g	☽ n. Lanx Aust.	scorp.	9	1	52	Moons setting
4	A	Whitsunday	scorp.	23	2	15	
5	b	☽ n. Cor. Scorp.	sagit.	7	2	37	
6	c	☽ n. Dex. M. ♃	sagit.	2[illegible]	Full	○	
7	d	Ember Week	capric.	8	9 A	41	
8	e	☽ n. Bor. C. ♑	capric.	23	10	27	
9	f	☽ n. Lu. in M. [illegible]	aquar.	7	11	14	
10	g	Sol in Cancer	aquar.	22	11	36	
11	A	St. Barnabas	pisces	16	11	58	
12	b	♄ ♉ 4	pisces	20	12	20	Moons rising.
13	c	♃ ♊ 11.	aries	4	0 M	20	
14	d	♂ ♓ 20.	aries	17	0	35	
15	e	♀ ♊ 17.	taur.	0	0	50	
16	f	Term begins	taur.	13	1	05	
17	g	☿ ♋ 17. R.	taur.	24	1	24	
18	A	1 Sund. p. Trin.	gem.	8	1	43	
19	b	☽ n. Dex. H. A.	gem.	20	2	14	
20	c	☽ n. Luc. P. [illegible]	canc.	2	2	41	
21	d	☽ n. Cast. & P.	canc.	14	New	●	Moons setting
22	e	☽ n. Procyon	canc.	26	9 A	47	
23	f	☽ n. Asellus	leo	8	10	10	
24	g	St. John Baptist	leo	20	10	32	
25	A	2 Sund. p. Trin.	virgo	2	10	54	
26	b	☽ n. Caud	virgo	14	11	09	
27	c	☽ n. Vindem.	virgo	26	11	23	
28	d	☽ n. Spica Vir.	libra	8	11	37	
29	e	St. Pet. & Paul	libra	2	11	54	
30	f	☽ n. Lanx. A.	scorp.	4	12	11	

Windy & drisling, then Fair and hot for a day or two, but showers are expected about the 4th and 6th days, then fair and hot weather ♂ ✶ ♀ for △ ☉ ☿ several Trinity Sunday days; but the 13th or 14th days may probably produce some Showers and Thunder therewith; then fair and hot, till about the □ ♂ ♀ new Moon which brings some cooling Showers, ♂ ☌ ☿ and 'tis expected to have the weather showery and very uncertain to the end of the month ✶ ♄ ♀.

Saturn riſeth about 1 in the Morning, Jupiter *riſeth a little before the Sun, as alſo doth* Venus, *they being very near together all the former part of the Month,* Mars *riſes between 12 and 1 in the Morning,* Mercury *at the beginning ſets after the Sun, at the end he is Combuſt.*

English Account.	Forein Account.		Rom. Kalendar. Rom. Saints Days					
1	12	b	Baſiliſtes	1	3	43	8	17
2	13	c	Cyrillus	2		43	8	17
3	14	d	Valerius	3		42		18
4	15	e	Trin. Sund.	4		42		18
5	16	f	Rulandus	5		42		18
6	17	g	Botolph	6		42		18
7	18	a	Marcus	7		41		19
8	19	b	Corp. Chr.	8		41		19
9	20	c	Regina.	9		41		19
10	21	d	Walburg.	10		41		19
11	22	e	1 Sun. Trin.	11	3	41	8	19
12	23	f	Baſilius	12		41		19
13	24	g	St. Jo. Bapt.	13		41		19
14	25	a	Amandus	14		42		18
15	26	b	Jeremias	15		42		18
16	27	c	7 Dorm.	16		42		18
17	28	d	Leo Papa.	17		42		18
18	29	e	St. Peter	18		43		17
19	30	f	Lucina	19		43		17
20	July		Tr. Sirith.	20	3	43	8	17
21	2	a	Viſit. V.M	21		44		16
22	3	b	Cornelius	22		44		16
23	4	c	Ulricus	23		45		15
24	5	d	Anſelm.	24		45		15
25	6	e	3 Sun. Trin.	25		46	8	14
26	7	f	Th. Becket	26		47		13
27	8	g	Grimbald	27		48		12
28	9	a	Cyrillus	28		49		11
29	10	b	7 Fratres	29	3	50		10
30	11	c	Benedict.	30	3	51	8	9

matter in each of them, then muſt the Earth attract theſe Waters not only 3600 times as much as the Moon, but 40 times 3600, or 144000. now whether the Moons attracting the Waters but as one, to one hundred forty four thouſand, that is, if the Earth doth attract the Waters, 144000 times more than the Moon doth, the queſtion is, whether ſuch attraction of the Moon be ſufficient to cauſe that ebbing and flowing of the Seas? And ſeems indeed very improbable. But if we ſhould for a while ſuppoſe this attraction to be the cauſe, it will not anſwer nor agree with Obſervations, for if either this ſuppoſed attraction, or the Moons Rarefying and Swelling the Waters was the cauſe of the Ebbing and Flowing, then in the large and vaſt Oceans that have Communication

July hath xxxi Days.

● Full Moon the 6th day at 2 in the morning.
☾ Last Quarter the 14th day at 7 at Night.
● New Moon the 20th day at 7 at Night.
☽ First Quarter the 28th day at 4 in the Afternoon.

1	g	☽ n. Laux. Bor.	scorp.	28	0 M	[illegible]
2	a	[illegible]	sagit.	10	0	28
3	b	☽ p. Dex. H. O.	sagit.	26	1	2
4	c	☽ n. Sin. M. ♑	capric.	11	1	36
5	d	Term Ends	capric.	26	2	30
6	e	☽ n. Luc. M. ♒	aquar.	1		●
7	f	☽ n. Sin. H. ♒	aquar.	26	9 A	36
8	g	☽ n. March. P.	pisces	1	9	57
9	a	5 Sund. p. Trin.	pisces	16	10	18
10	b	♄ ☌ ♃	aries	1	[illegible]	38
11	c	[illegible]	aries	14	10	54
12	d	Sol in Leo	aries	27	11	9
13	e	♂ ☌ Virgil	taur.	10	11	24
14	f	♀ ☾	tauri	23	[illegible]	4
15	g	Swithin	gem.	5	12	[illegible]
16	a	6 Sund. p. Trin.	gem.	17	0 M	[illegible]
17	b	☿ ☌ 16.	gem.	29	0	4
18	c	☽ n. Luc. P. ♊	canc.	11	1	5
19	d	☽ n. Pollux	canc.	23	3	45
20	e	☽ n. Asellus	leo	5		●
21	f	☽ n. Au. in C. ♌	leo	17	8 A	39
22	g	☽ n. Cor. Leon	leo	29	8	56
23	a	7 Sund. p. Trin.	virgo	11	9	13
24	b	☽ n. Clud. Le.	virgo	23	9	3
25	c	St. James	libra	5	9	45
26	d	☽ n. Spica Vir.	libra	17	10	[illegible]
27	e	☽ n. Laux Aust.	scorp.	0	10	14
28	f	☽ n. Laux Bor.	scorp.	13	10	35
29	g	☽ n. Cor. Scor.	scorp.	27	10	56
30	a	8 Sund. p. Trin.	sagit.	10	11	34
31	b	☽ n. Sin. Man. ♐	sagit.	25	12	13

Moons setting

Moons rising

Moons setting

Windy at th
☌ ♀ ☿ beginnin
then hot and sult
weather is expect
for some days, an
about the 8
day some drislin
showers, then fa
for some time, b
about the 13th
14th days som
showers are exp
cted, then follo
an in- △ ☉
crease ☐ ♄ ☉
heat, and about t
new Moon som
brisk winds wi
some drisling, an
about the 24th
25th days som
showery □ ♄
weather △ ♂
is expected, and al
towards the e
□ ♄ ☿ of the
Month som
Showers.

Rom. Kalendar.

Forein Account.

1	12	[illegible]
2	13	[illegible]
3	14	[illegible]
4	15	[illegible]
5	16	[illegible]
6	17	[illegible]
7	18	[illegible]
8	19	[illegible]
9	20	[illegible]
10	21	[illegible]
11	22	[illegible]
12	23	[illegible]
13	24	[illegible]
14	25	[illegible]
15	26	[illegible]
16	27	[illegible]
17	28	[illegible]
18	29	[illegible]
19	30	a
20	31	b
21	Aug.	[illegible]
22	2	d
23	3	[illegible]
24	4	f
25	5	g
26	6	a
27	7	b
28	8	c
29	9	d
30	10	[illegible]
31	11	f

July, 17[illegible].

Saturn at the beginning riſeth a little before Midnight, at the end he riſeth at 10 at Night, Jupiter riſeth about 1 in the Morning: Mars riſes about 11 at Night, Venus and Mercury riſe before the Sun, but are preſently hid under his Beams.

Engl. Account	Foren Account.	Rom. Kalendar.	Rom. Saints days.						
1	12	d	Anacletus	round the Globe, there would	1	3	52	8	8
2	13	[illegible]	S. p. Trin. ✶	be but one High Water, and	2		53		7
3	14	f	Bonavent.	one Low Water in 24 hours,	3		54		6
4	15	g	Swithin ♌	& in theſe and other large	4		55		5
5	16	a	Kenelm ✶	Seas, as the Mediterranean,	5		56		4
6	17	b	Hilarius	which is extended in length	6		58		2
7	18	c	Alexius	from Weſt to Eaſt; this	7	3	59		1
8	19	d	Maternus	ſuppoſed attraction would	8	4	0	8	0
9	20	[illegible]	S. p. Trin.	cauſe the Waters to riſe or	9		1	7	59
0	21	f	Praxeda	ſwell up (as much if not	10		3		57
1	22	g	Mary Mag.	more) in the midſt of theſe	11		5		55
2	23	a	Apollon	Seas, as elſewhere, but the	12		6		54
3	24	b	Chriſtina △	contrary appears; for tho'	13		7		53
4	25	c	St. James	the Moon runneth every day	14		9		51
5	26	d	Anna	the whole length of the	15		10		50
6	27	[illegible]	S. p. Trin.	Mediterranean, yet the Wa-	16	4	11	7	49
7	28	f	Panthol	ters riſe very little, except	17		12		48
8	29	g	Beatrix	in the extream bounds of it	18		14		46
9	30	a	Abdon	Eaſtward, and Weſtward, or	19		16		44
0	31	b	German □	where its courſe is interce-	20		17		43
1	Aug.	[illegible]	Lammas	pted by Creeks, Cliffs and	21		19	7	41
2	2	d	Moſes	Banks, but in the middle	22		20		40
3	3	[illegible]	7 S. p. Trin.	parts where the attraction	23		22		38
4	4	f	Ariſtarch.	ſhould make the greateſt	24		24		36
5	5	g	Feſt. Nivis	riſing or ſwelling of the	25	4	25	7	35
6	6	a	Sixtus	Waters, there is only found	26		27		33
7	7	b	Cyriacus	a great Current to & again,	27		29		31
8	8	c	Romanus	without changing height, as	28		31		29
9	9	d	Theodoſius	about *Corſica*, *Sardinia*,	29		33		27
0	10	[illegible]	S. p. Trin.	*Malta*, *Candia*, &c. where	30		35		25
1	11	f	Tiburtius	the	31	4	37	7	23

Auguſt hath XXXI Days.

● Full Moon the 4th day at 9 in the Morning.
☾ Laſt Quarter the 11th at 7 in the Morning.
● New Moon the 19th day at 10 in the Morning.
☽ Firſt Quarter the 27th day at 2 in the Morning.

1	c	Lammas	capric	9	0 M	12	
2	d	☽ n. Auſt.C. ♑	capric	24	1	23	
3	e	☽ n. Luc. in M ♒	aquar.	9	2	34	Moons ſetting
4	f	☽ n. Dex. H. ♒	aquar.	24	Full		
5	g	☽ n. March. P.	piſces	9	8 A	25	
6	𝔄	8 Sund. p. Trin	piſces	24	8	42	
7	b	☽ n. Algenib.	aries	9	9	00	
8	c	☽ n. pr. ✱ Ar.	aries	22	9	15	
9	d	☽ n. Manker	taur.	6	9	36	
10	e	St. Lauren.	taur.	19	9	56	
11	f	☽ n. Aldebar	gem.	2	10	16	
12	g	Sol in Virgo	gem.	14	10	50	
13	𝔄	9 Sund. p. Trin	gem.	26	11	24	☽ Moons riſing
14	b	☽ n. Luc. P. ♊	canc.	8	12	17	
15	c	♄ ♉ 6. R.	canc.	20	0 M	17	
16	d	♃ ♉ 21.	leo	2	1	11	
17	e	♂ ♈ 10. R.	leo	14	2	18	
18	f	♀ ♍ 5.	leo	26	3	25	
19	g	☿ ♍ 16.	virgo	8	New		
20	𝔄	10 Sund. p. T	virgo	20	7 A	44	
21	b	☽ n. Vindem.	libra	2	7	58	
22	c	☽ n. Spica Vir.	libra	15	8	12	
23	d	☽ n. Lanx Auſt.	libra	27	8	25	
24	e	St. Bartholom	ſcorp.	10	8	45	☽s ſetting
25	f	☽ n. Su. in F. ♏	ſcorp.	23	9	05	
26	g	☽ n. Cor Scorp.	ſagit.	07	9	3	
27	𝔄	11 Sund. p. T	ſagit.	20	10	10	
28	b	☽ n. Sin M. ♑	capric.	4	11	12	
29	c	☽ n. Ult. in C. ♑	capric.	19	12	15	
30	d	☽ n. L. in M. ♒	aquar.	3	0 M	15	
31	e	☽ n. Sin H. ♒	aquar.	18	1	42	

At the begining ✱ ♃ ☉ ſome ſhowery weather ☌ ♀ ☿ is expected ✱ ♃ ☿ and ✱ ♃ ♀ continues for ſome time ☌ ☉ ☿ then fair for ſome days, and about the 11th or 12th days high winds and △ ♄ ☿ ſtormy weather, afterwards we may expect ſeaſonable and good weather. △ ♄ ☉ But about the new Moon ☌ ☉ ♀ ſome ſhowers of Rain, □ ♃ ☿ then fair for ſome time, but the 25th day may probably produce both Wind & Rain, and continues windy, and ſomewhat unconſtant weather to the end ☍ ♂ ☿ of the Month.

August, 1704

Saturn at the beginning riſeth between 9 and 1 at Night, at the end he riſeth about 8, and is the South about 3 in the Morning. Jupiter riſeth abou 11 at Night. Mars at the beginning riſes about 9 a Night, and is South about 3 in the Morning, at the end he is South between 1 and 2. Venus and, &c.

English Account.	Forein Account.	Rom. Kalendar.	Rom. Saints days					
1	12	g	Clara V.	1	4	39	7	21
2	13	a	Amatus	2		41		19
3	14	b	Euſebius	3		42		18
4	15	c	Aſſu. V.M.	4		44		16
5	16	d	Rochus	5		46		14
6	17	E	9 S.p.Trin.	6		48		12
7	18	f	Helena	7		50		10
8	19	g	Clintan	8		52		8
9	20	a	Fauſta	9		54		6
10	21	b	Privatus	10		56		4
11	22	c	Symphron	11	4	58	7	2
12	23	d	Zacheus	12	5	00	7	0
13	24	E	St. Barthol	13		1	6	59
14	25	f	Ludovicus	14		3		57
15	26	g	Severin.	15		5		55
16	27	a	Ruffus	16		7		53
17	28	b	Auguſtin.	17		8		52
18	29	c	Decol. J.B.	18		10		50
19	30	d	Felix	19		12		48
20	31	E	11 S.p.T.	20	5	14	6	46
21	Sept.		Ægidius	21		16		44
22	2	g	Anthony	22		18		42
23	3	a	Mamert	23		20		40
24	4	b	Theodoſia	24		22		38
25	5	c	Moſes	25	5	24	6	36
26	6	d	Magna	26		26		34
27	7	E	12 S.p.T.	27		28		32
28	8	f	Nat. V. M.	28		30		30
29	9	g	Gorgon	29		32		28
30	10	a	Hilar. P.	30	5	34	6	26
31	11	b	Felix	31		36		24

the change of Water mark, is very ſmall, but the Current very great. Again, if we allow the Moon to make ſuch attraction of the waters, muſt not we grant alſo that the nimble and gravitating fluid the Air, is alſo attracted by her, and the Atmoſphere being of that height and gravity that it doth ordinarily ballance about 34 feet depth of Water, muſt not this alſo be attracted by the Moon and follow her, as the Water is ſuppoſed to do. But can this be, and the Baroſcope not affected thereby? Whatever other alterations hath been found in the Atmoſphere, this Diurnal one the Baroſcope hath not yet diſcovered.

As to other Opinions, ſuch as the Preſſure of the Moon, the different depths of the Sea, the ſtrife betwixt the freſh water and the ſalt, they are ſo far from being the prime cauſe of the ebbing and

September hath XXX Days.

● Full Moon the 2d day at 3 in the Afternoon.
☾ Laſt Quarter the 9th day at 8 at Night.
New Moon the 18th day at 2 in the Morning.
☽ Firſt Quarter the 25th day at 9 in the Morning.

1	f	☽ n. Dex.H. ♒	piſces	3	3 M	8	
2	g	☽ n. Marc.Peg	piſces	18	[illegible]	[illegible]	
3	A	12 Sund. p. Tr.	aries	3	7 A	1	
4	b	☽ n.prim. ✱ ♈	aries	17	7	28	
5	c	☽ n.Lu.in C. ♈	taur.	1	[illegible]	45	Moons ſetting.
6	d	☽ n. Manker	taur.	14	8	2	
7	e	☽ n. Pleiades	taur.	28	8	31	
8	f	☽ n. Alhaiot	gem.	10	9	00	
9	g	☽ n. Dex.H.A.	gem.	23	9	9	
10	A	13 Sund. p. Tr.	canc.	5	10	15	
11	b	☽ n.Caſt.&Pol	canc.	17	11	07	
12	c	Sol in Libra	canc.	28	12	13	
13	d	♄ ♉ 5. R.	leo	10	[illegible] M	13	
14	e	Exalt. Crucis	leo	22	1	15	
15	f	♃ ♊ 26.	virgo	4	2	31	
16	g	♂ ♈ 3. R.	virgo	16	3	45	
17	A	14 Sund. p. Tr.	virgo	29	4	56	
18	b	♀ ♎ 14.	libra	11	New ●		
19	c	☿ ♏ 2.	libra	24	6 A	42	Moons riſing.
20	d	Ember Week	ſcorp.	7	7	7	
21	e	St. Matthew	ſcorp.	20	7	18	
22	f	☽ n.Cor.Scorp.	ſagit.	3	7	42	
23	g	☽ n.t. ex H.O.	ſagit.	17	8	7	
24	A	15 Sund. p. Tr.	capric.	1	9	9	
25	b	☽ n.Ult.in C. ♐	capric.	15	10	11	
26	c	☽ n.Bor.Co. ♑	capric.	29	11	30	
27	d	☽ n. Sin.H. ♒	aquar.	13	12	50	
28	e	☽ n. Dex.H. ♒	aquar.	27	[illegible] M	50	
29	f	St. Michael	piſces	12	2	18	
30	g	☽ n. Algenib	piſces	26	3	26	

☍ ♂ ☿ Cold winds at the beginning, with ſome froſty mornings, then follows ſome cold driſlings, and otherwhiles ſome briſk gales of wind with ſhowers of Rain about the 9th ☍ ♂ ♀ or 10th ☍ ♂ ☉ days, and concludes windy then follows cloudy and cloſe weather for ſome days, and about the new moon ſome Rain is expected, with ſome briſk winds, ☍ ♄ ♀ about the 21ſt day, then ſome miſty and foggy weather is expected, and about the 26th and 28th days we may probably have both Wind and Rain.

Saturn *at the beginning is South between* 2 *and* 3 *in the Morning, at the end he is South before* 1. Jupiter *riseth between* 9 *and* 10 *at Night.* Mars *is South about Midnight.* Venus *is hid under the Sun Beams,* Mercury *sets a little after the Sun.*

English Account.	Forein Account.	Rom. Kalendar.	Rom. Saints days.						
1	12	c	Guido	and flowing, that they de-	1	5	38	6	22
2	13	d	Amatus	serve not now to be consi-	2		40		20
3	14	e	[illegible]	dered, they look like poetic	3		42		18
4	15	f	Nicomed.	Fables, which as some are	4		44		16
5	16	g	Edith.	apt to invent, others are as	5		46		14
6	17	A	Lampr.	much inclined to believe, I	6		48		12
7	18	b	Fereolus	shall now proceed to shew	7		50		10
8	19	c	Januarius	how the motion of the Earth	8		52		8
9	20	d	Fausta	is the primary and grand	9		55		5
10	21	e	S. Matth.	cause of the Ebbing and	10		57		3
11	22	f	Maurice	Flowing of the Seas, the Seas	11	5	59	6	1
12	23	g	Tecla Vir.	being as Vessels containing	12	6	1	5	59
13	24	A	Rupert	the Waters, if these vessels	13		3		57
14	25	b	Cleophas	be moved with a motion,	14		5		55
15	26	c	Cyprian	not uniform, but unequal,	15		7		53
16	27	d	Cos. & Da.	sometimes accelerating, and	16		9		51
17	28	e	[illegible] S.p.Tri.	sometimes retarding, the	17		11		49
18	29	f	S. Michael	waters contained in such	18		13		47
19	30	g	Hierom	vessel, or vessels, not being	19		15		45
20	1	A	[illegible]	fixed thereto, but by reason	20	6	17	5	43
21	2	b	Leodegar.	of its fluidity, as if it were	21		19		41
22	3	c	Maximin.	at liberty, and not obliged	22		21		39
23	4	d	Francis	to follow the imitations of	23		23		37
24	5	e	16 S.p.Tr.	the vessel, must hereby	24		25		35
25	6	f	Fides	fluctuate, and run to and	25		27		33
26	7	g	Marc. &c	fro, for if such Vessel be	26		29		31
27	8	A	Pelagia	retarded in its motion, the	27		31		29
28	9	b	Dyonisius	water keeping part of its	28		33		27
29	10	c	Burchard	former *Impetus*, will run	29		35		25
30	11	d	Gideon	towards	30	6	37	5	23

October hath XXXI Days.

● Full Moon the 2d day at 3 in the Morning.
☾ Laſt Quarter the 9th day at 5 in the Afternoon.
● New Moon the 17th day at 4 in the Afternoon.
☽ Firſt Quarter the 24th day at 6 at Night.
● Full Moon the 31ſt day at 4 in the Afternoon.

1	A	16 Sund.p.Tr.	aries	11	5 M	14	
2	b	☽ n. pr. ✳ Ar.	aries	25	Full	●	
3	c	☽ n. Manker	taur.	9	6 A	13	
4	d	☽ n. Pleiades	taur.	22	6	40	
5	e	☽ n. Aldebar.	gem.	5	7	6	Moons riſing.
6	f	☽ n. Alhaiot	gem.	18	7	32	
7	g	☽ n. Dex.H.A.	canc.	1	8	20	
8	A	17 Sund.p.Tr.	canc.	13	9	07	
9	b	☽ n. Pollux	canc.	25	10	04	
10	c	☽ n. Aſelles	leo	6	11	12	
11	d	☽ n. Cor.Leon.	leo	18	12	19	
12	e	Sol in Scorpio	virgo	0	0 M	19	
13	f	☽ n. L.in T.♌	virgo	12	1	32	
14	g	☽ n. Caud.Le.	virgo	24	2	44	
15	A	18 Sund.p.Tr.	libra	7	3	58	
16	b	♄ ♉ 2. R.	libra	20	5	12	
17	c	♃ ♊ 26. R.	ſcorp.	3	New	—	
18	d	St. Luke	ſcorp.	16	5 A	26	Moons ſetting.
19	e	♂ ♓ 28. D.	ſagit.	0	5	54	
20	f	♀ ♏ 24.	ſagit.	14	6	23	
21	g	☿ ♏ 00.00.	ſagit.	28	7	16	
22	A	19 Sund.p.Tr.	capric.	12	8	08	
23	b	Term begins	capric.	26	9	23	
24	c	☽ n.L. in M.♒	aquar.	16	10	38	
25	d	Criſpin	aquar.	24	12	04	
26	e	☽ n.Dex.M.♒	piſces	8	0 M	04	
27	f	☽ n. Marchab.	piſces	22	1	30	
28	g	St.Sim.& Jude	aries	5	2	53	
29	A	20 Sund.p.Tr.	aries	20	4	15	
30	b	☽ n. Manker	taur.	4	5	40	
31	c	☽ n. Pleiades	taur.	17	Full	●	

Miſts and Winds follow, bringing Rain about the 4th or 5th day, and continues ſhowery, then fair for ſome days, yet △ ♃ ☉ miſty mornings, & ſome ♂ ☿ times very foggy, then follows ſhowery and wet weather, ☍ ♄ ☉ which is likely to continue ☌ ☉ ♀ till the new Moon, then expect high winds to follow, afterwards ſome froſty mornings, & about the 22d or 23d, high winds △ ♂ ♀ return, which bring Rain about the 24 and 25th, afterwards tis hoped we may have more temperate weather for ſome days, yet at the end ſome moiſt weather.

October, 1704.

Saturn is South about Midnight, Jupiter *at the beginning riseth between* 8 *and* 9 *at Night, and is South between* 4 *and* 5 *in the Morn. at the end he is South between* 2 *and* 3. Mars *is South about* 10 *at Night*, Venus *emergeth from under the SunBeams, and sets after the Sun.* Mercury *is Combust.*

English Account.	Forein Account.	Rom. Kalendar.	Rom. Saints days.						
1	12		17 S.p.Tr.	towards the preceding part,	1	6	39	5	21
2	13	f	Telemach.	and there of necessity must	2		41		19
3	14	g	Calixtus	rise; and on the contrary, if	3		43		17
4	15	a	Hedwig	the vessel be pushed on, and	4		45		15
5	16	b	Gallus	its motion accelerated, the	5		48		12
6	17	c	Florent	water before it can acquire	6	6	50	5	10
7	18	d	St. Luke.	this new motion, falleth			52		8
8	19		18 S.p.T.	back towards the following	8		54		6
9	20	f	Wendelin	part of the vessel, and there	9		56		4
10	21	g	Cordula	riseth also: And that it will	10	6	58	5	2
11	22	a	40 Vir. Ma.	thus fall out, any one may	11	7	00	5	0
12	23	b	Roman	experiment by having water	12	7	2	4	58
13	24	c	Salome	carried in Vessels, especially	13		4		56
14	25	d	Crispin	of some considerable length.	14		6		54
15	26		19 S.p.T.	But it is most plainly and	15	7	8	4	52
16	27	f	Ursula	easily discovered in Boats or	16		10		50
17	28	g	SS.Sim.&J.	Barges imployed in carrying	17		12		48
18	29	a	Narcissus	water from place to place, for	18		14		46
19	30	b	Theorest.	these being by running foul	19		16		44
20	31	c	Wolfgang	one upon another, or by any	20		18		42
21	Nov.		All Saints	other impediment, suddenly	21	7	20	4	40
22	2		20 S.p.T.	and considerably retarded in	22		21		39
23	3	f	Theophil.	their motion, the water in	23		23		37
24	4	g	Amandus	these contained, retaining its	24		25		35
25	5	a	Lætus	former Impetus, will run for-	25		27		33
26	6	b	Leonard	wards toward the Prow	26	7	29	4	31
27	7	c	Florent	where it will considerably	27		31		29
28	8	d	Severus	rise, and will fall as much	28		33		27
29	9		21 S.p.T.	a Stern. But on the contrary	29		35		25
30	10	f	Martin P.	it in the midst of a gentle	30		37		23
31	11	g	Martin Ep.	course,	31	7	38	4	22

November hath XXX Days

☾ Laſt Quarter the 8th day at 2 in the Afternoon.
● New Moon the 16th day at 6 in the Morning.
☽ Firſt Quarter the 22d day at Midnight.
○ Full Moon the 30th day at 7 in the Morning.

1	d	All Saints	gem.	1	4 A	57	Moons riſing
2	e	☽ n. Alhaiot	gem.	14	5	32	
3	f	☽ n. Dex. H. A.	gem.	26	6	06	
4	g	☽ n. Luc. Pe. ♊	canc.	9	7	01	
5	A	Sund. Pow. Pl.	canc.	21	7	56	
6	b	☽ n. Aſellos	leo	4	9	00	
7	c	☽ n. Au. in C. ♌	leo	14	10	04	
8	d	☽ n. Cor. Leon.	leo	26	11	14	
9	e	☽ n. Terg. Leo.	virgo	8	12	24	
10	f	☽ n. Caud. Leo.	virgo	20	0 M	24	
11	g	Sol in Sagitta.	libra	2	1	37	
12	A	22 Sund. p. T.	libra	15	2	47	
13	b	♄ ♉ 0 R.	libra	28	4	4	
14	c	♃ ♊ 23. R.	ſcorp.	11	5	20	
15	d	♂ ♈ 4.	ſcorp.	25	6	43	
16	e	♀ ♐ 28.	ſagit.	9	New	●	Moons ſetting
17	f	St. Hugh	ſagit.	23	4 A	53	
18	g	☿ ♏ 24.	capric.	8	5	56	
19	A	23 Sund. p. T.	capric.	22	7	0	
20	b	☽ n. L. in M. ♒	aquar.	6	8	21	
21	c	☽ n. Sin. H. ♒	aquar.	21	9	44	
22	d	☽ n. Dex. M. ♒	piſces	5	11	8	
23	e	☽ n. March. P.	piſces	19	12	32	
24	f	☽ n. Algenib	aries	3	0 M	32	
25	g	☽ n. pr. [illegible] Ar.	aries	16	1	54	
26	A	24 Sund. p. T.	aries	25	3	15	
27	b	☽ n. Manker.	taur.	13	4	36	
28	c	Term Ends	taur.	26	5	57	
29	d	☽ n. Aldebar.	gem.	4	[illegible]	07	
30	e	St. Andrew	gem.	22	Full	○	

☌ ♄ ☿ driſling Rain is expected at the beginning, then temperate for ſome days, but about the 6th day begins windy and turbulent weather, with Rain or Snow, then follows ſome Hoar Froſts, with ☌ ♃ ♀ Miſts and ✶ ☉ ♂ foggy weather, with cold ſharp winds about the 15th or 16th days, and ✶ ♄ ☌ continues windy & ſtormy, alſo about the 22d day high winds □ ☌ ♀ with cold Rain or Snow is expected, then follows ſome Froſts, but towards the ✶ ♂ ☿ end foggy, cloudy and cloſe weather is expected

November, 1704

English Account.	Forein Account.	Rom. Kalendar.	Rom. Saints days	Saturn *at the beginning is South a little before* 11, *at the end he is South before* 9 *at Night, and ſets between* 3 *and* 4 *in the Morning.* Jupiter *at the Beginning is South about* 2 *in the Morning, at the end he is South about Midnight.* Mars *is South between* 8 *and* 9 *at Night.* Venus *ſets after the Sun.*					
1	12	a	Ludovick	courſe, ſuch veſſels ſhould be	1	7	39	4	21
2	13	b	Aſcanius	ſuddenly puſh'd forwards, by	2		41		19
3	14	c	Frederick	any means, and thereby have	3		43		17
4	15	d	Leopold	their motion conſiderably	4		45		15
5	16	e	[illegible]	augmented, the waters con-	5		46		14
6	17	f	Hugo B.	tained, before they can ha-	6		48		12
7	18	g	Oct. Mart.	bituate themſelves to this	7		49		11
8	19	a	Elizabeth	new motion, ſhall ſtay be-	8		51		9
9	20	b	Auguſtus	hind, that is, a-ſtern, where	9		52		8
10	21	c	Oblat. V. M.	they muſt riſe, and muſt at	10	7	54	4	6
11	22	d	Cæcilia	the ſame time fall as much	11		55		5
12	23	e	[illegible]	at the Prow, yet all this while	12		57		3
13	24	f	Chryſogon	in the midſt of theſe veſſels	13		58		2
14	25	g	Catharin	there will be but very little	14	8	00	4	00
15	26	a	Conradus	riſing or falling of the wa-	15	8	1	3	59
16	27	b	Guntherus	ters, but a conſiderable run-	16		2		58
17	28	c	Ruffus	ning, forwards & backwards	17		4		56
18	29	d	Saturn	according to the Retardation,	18		5		55
19	30	e	St. Andr.	or Acceleration of the Veſſels	19		6		54
20	Decemb.	f	Eligius	The ſame thing happens to	20	8	7	3	53
21	2	g	Libanus	the waters in the Seas, the	21		8		52
22	3	a	Caſſian	Seas are the veſſels contai-	22		9		51
23	4	b	Barbara	ning the waters contained,	23		10		50
24	5	c	Sabina	are cauſed to fluctuate, and	24		11		49
25	6	d	Nicholas	run to and fro by the uneven	25	8	12	3	48
26	7	e	2 S. Advent	motion of theſe veſſels. But	26		13		47
27	8	f	Con. V. M.	the greateſt Fluctuations, or	27		14		46
28	9	g	Cyprian	moſt conſiderable ebbings &	28		15		45
29	10	a	Elaria	flowings are obſerved in the	29		15		45
39	11	b	Damaſus	extreams	30	8	16	3	44

December hath XXXI Days.

☾ Last Quarter the 8th Day at 11 in the Morning.
● New Moon the 15th day at 6 at Night.
☽ First Quarter the 22d day at 10 in the Morning.
● Full Moon the 30th Day at 1 in the Morning.

1	f	☽ n. Luc. P. ♂	canc.	4	4 A	33	
2	g	☽ n. Cast. & Pol.	canc.	17	5	32	
3	A	Advent Sunday	canc.	29	6	32	Moons rising.
4	b	☽ n. Asellos	leo	11	7	48	
5	c	☽ n. Cor. Leon.	leo	23	8	49	
6	d	☽ n. Cor. T. Le.	virgo	4	9	58	
7	e	☽ n. Caud. Leo.	virgo	16	11	08	
8	f	☽ n. Vindem.	virgo	28	12	19	
9	g	☽ n. Spica Vir.	libra	10	0 M	19	
10	A	2 Sund. in Adv.	libra	23	1	39	
11	b	Sol in Capric.	scorp.	6	2	47	
12	c	☽ n. Lanx Bor.	scorp.	19	4	03	
13	d	☽ n. Autares	sagit.	3	5	27	
14	e	♄ ♈ 29. St.	sagit.	17	6	50	
15	f	♃ ♊ 19. R.	capric.	2	New	[illegible]	
16	g	♂ ♈ 17.	capric.	16	4 A	26	
17	A	3 Sund. in Adv.	aquar.	1	5	50	Moons setting
18	b	♀ ♒ 7.	aquar.	16	7	13	
19	c	☿ ♑ 13.	pisces	1	8	40	
20	d	Ember Week	pisces	15	10	06	
21	e	St. Thomas	pisces	29	11	27	
22	f	☽ n. Vent. Ceti	aries	13	12	48	
23	g	☽ n. pr. ✱ Ar.	aries	27	0 M	48	
24	A	4 Sund. in Adv.	taur.	10	2	8	
25	b	Nativ. Christi	taur.	23	3	27	
26	c	St. Stephen	gem.	6	4	43	
27	d	St. John	gem.	18	6	00	
28	e	Innocents	canc.	1	7	2	
29	f	☽ n. Castor	canc.	13	8	5	
30	g	☽ n. Pollux	canc.	25	Full	[illegible]	
31	A	Sund. p. Christ.	leo	07	5 A	09	

☍ ♄ ☉ Foggy and close at the beginning, then follows winds with ☍ ♃ ♄ Snow, and also frosty weather about this time, which continues for △ ♄ ☉ some [illegible] days △ ♄ ☿ with sharp winds about the 12th ♉ ☉ ♀ and 13th. But the 14th or 15th is yielding with a thaw, then temperate with some slight Frosts, & about the 19th, Mists and the foggy weather continues for several days with cold Rain or Snow, □ ♃ ☿ about the 22d or 23d days, △ ♄ ♀ and towards the end windy weather with some drisling is expected.

December, 1704.

Saturn *is South betwixt* 7 *and* 8 *at Night, and ſets betwixt* 2 *and* 3 *in the Morning.* Jupiter *at the beginning is South at Midnight, at the end he is South before* 10 *at Night.* Mars *is ſouth between* 6 *and* 7 *at Night, and ſets about* 1 *in the Morn.* Venus *ſets about* 6 *at Night.* Mercury *is Combuſt.*

English Account	Forein Account	Rom. Kalendar	Rom. Saints days					
1	12	c	Valerius	1	8	16	3	44
2	13	d	Lucia V.	2		17		43
3	14	E	3 S. Advent	3		17		43
4	15	f	Abraham	4		18		42
5	16	g	Ananias	5		18		42
6	17	a	Lazarus	6		18		42
7	18	b	Rufus	7		19		41
8	19	c	Loth	8		19		41
9	20	d	Ammon	9		19		41
10	21	E	St. Thomas	10	8	19	3	41
11	22	f	30 Mart.	11		19		41
12	23	g	Victor	12		19		41
13	24	a	Ignatius	13		19		41
14	25	b	Christmas	14		18		42
15	26	c	St. Stephen	15		18		42
16	27	d	St. John	16		18		42
17	28	E	Innocents	17		17		43
18	29	f	Jonathan	18		17		43
19	30	g	David	19	8	16		44
20	31	a	Silveſter	20		16	3	44
21	Jan.		1705. Circ	21		15		45
22	2	b	Abel	22		15		45
23	3	c	Enoch	23		14		46
24	4	D	2 S. p. Chri	24		14		46
25	5	e	Simeon	25	8	13		47
26	6	f	Epiphany	26		12		48
27	7	g	Juliana	27		11		49
28	8	a	Erhard	28		10		50
29	9	b	Marcel.	29		9		52
30	10	c	Nicanor	30	8	8		52
31	11	D	1 S. p. Epip	31		7		53

extreams of theſe veſſels, that is, on the ſhores of large Continents, or the ſhores of Iſlands, that ſtand near to the Continents; and the greateſt currents or running forwards and backwards, without any conſiderable riſing or falling of the water, is in the midſt of large Seas, far diſtant from the Continent, and which lye in length from Eaſt to Weſt, and the water marks in ſuch Seas, are ſmall Iſlands that are alſo far from the Continent. There are extraordinary Currents alſo in ſome ſtreights, where the Seas (as it were) empty themſelves into one another, but eſpecially if ſuch ſtreights lye in length, Eaſt and Weſt, &c.

Now it remains to ſhew that the Seas, and indeed all parts of the Earth, are moved with a motion, uneven, or not ſo uniform and regular, but that there is a continual Acceleration and Retardation, ſufficient to cauſe ſuch ebbing and flowing as is obſerved; and this ariſeth from the mixture of the two Motions of the Earth, annual and diurnal, for from theſe two motions, each of itſelf uniform, there ariſeth a motion, unequal or uneven, ſometimes much accelerated, other times much retarded, of which ſee further in the 2d part or latter end of this Almanack

TABLE ſhewing how many Years purchaſe a Leaſe or Annuity (to endure for any number of Years under 33) is worth proſently, at Intereſt upon Intereſt, at Six in the Hundred; and ſhewing plainly how to diſcount any Leaſe in being; and the value of the Reverſion after any number of Years.

Years of a Leaſe.	Years.	Months.	10th parts.	Years of a Leaſe.	Years.	Months.	10th parts.
1	0	11	0	17	10	5	8
2	1	9	9	18	10	9	3
3	2	8	1	19	11	1	9
4	3	5	9	20	11	5	7
5	4	2	5	21	11	9	3
6	4	11	1	22	12	0	6
7	5	7	0	23	12	3	6
8	6	2	7	24	12	6	6
9	6	9	9	25	12	9	4
10	7	4	3	26	13	0	0
11	7	10	7	27	13	2	5
12	8	4	6	28	13	4	9
13	8	10	3	29	13	7	1
14	[illegible]	3	6	30	13	9	2
15	9	8	5	31	13	11	1
16	10	1	3	32	14	1	0

The Uſe and Explanation of the TABLE.

The firſt Column towards the left Hand ſheweth the Years of a Leaſe, or Annuity, and right againſt each Year, is the Years, Months and Tenth Parts of a Months purchaſe, that ſuch a Leaſe or Annuity is worth.

Example.

Suppoſe a Leaſe or Annuity to continue 12 Years, and you would know how many Years purchaſe it is worth in preſent Mony, look in the Table for Twelve Years of a Leaſe to the left Hand, and againſt the ſame you ſhall find 8, 4, 6, which ſheweth that ſuch a Leaſe is worth 8 Years, 4 Months, and 6 Tenth parts of a Months Purchaſe.

AGAIN;

If you are to take or buy the Reverſion of any Leaſe or Annuity, work thus; Suppoſe the Leaſe to be Thirty Years in all, you find in the Second Table and Right Hand againſt Thirty 13 Years, 9 Months, and 2 Tenth Parts of a Months Purchaſe; this it were worth were it in preſent Poſſeſſion. But ſuppoſe there be a Leaſe of five Years (more or leſs) before you commence, look in the Table againſt the five Years, and there you find four Years, two Months, and 5 Tenth parts of a Months purchaſe: Take this out of the Sum againſt Thirty, which is, 13, 9, 2, the Remainder is, 9, 6, 7, which is 9 Years, 6 Months, and 7 Tenth Parts of a Month; and ſo much is the Reverſion after five Years worth, the Remainder of Thirty Years

This is Uſeful, and very Eaſie.

SAUNDER, 1704.

The Second Part.

Containing the Eclipſes; the Suns Quarterly Ingreſſes, the Southing of the ſeven Stars for every 5th. day of this Year: With directions for finding the Riſing, Southing, and Setting of ſeveral Fixed Stars; Alſo Tables to Meaſure Timber: With other things worth Obſervation.

The Characters of the Twelve Signs, and what parts of the Body they are ſaid to govern.

Aries, *Head & Face*; ♉ Taurus, *Neck & Throat*; ♊ Gemini, *Arms & Shoulders*; ♋ Cancer, *Breaſt & Stomach*; ♌ Leo, *Heart & Back*; ♍ Virgo, *Bowels & Belly*; ♎ Libra, *Reins & Loins*; ♏ Scorpio, *Secrets*; ♐ Sagittary, *Thighs*; ♑ Capricorn, *Knees*; ♒ Aquarius, *Legs*; ♓ Piſces, *the Feet*.

he Characters of the Planets, with the Dragons Head and Tail, ♄ Saturn, ♃ Jupiter, ♂ Mars, ☉ Sol, ♀ Venus, ☿ Mercury, ☽ Moon, ☊ Dragons Head, ☋ Dragons Tail.

The Aſpects.

Conjunction, ✱ Sextile, □ Quartile, △ Trine, ☍ Oppoſition

Brief Chronology of Memorable Things, to this Year, 1704.

THe Creation of the World	5653
Noahs Flood	3997
The deſtruction of Sodom and Gomorrah	3606
The deſtruction of Troy	2886
Brute entred this Iſland	2811
The Building of *London*	2811
The Building of *York*	2593
The Building of *Leiceſter*	2657

Since

The building of *Canterbury*	259
The building of *Stamford*	256
The building of *Rome*	245
The deſtruction of *Jeruſalem* by *T. Veſp.*	161
England firſt received the Chriſtian Faith	152
The Tower of *London* built	113
Duke *William* conquered *England*	63
Weſtminſter Hall was built	60
The Bible divided into Chapters	50
The Invention of Guns	32
The Art of Printing	26
St. *Pauls* Steeple fired by Lightning	1
New Star in *Caſſiopeia*	1
A great Snow fell *Feb.* 4.	1
Tilbury Camp on St. *James*'s day	1
A Plague in *London*, whereof dyed 30598	1
Gunpowder Treaſon, *November* 5.	9
A great Snow, and *Smithfield* paved	8
A great Plague in *London*, whereof dyed 35418	
The Long Parliament began, *November* 3.	
King *Charles* the Firſt was Murdered	
Two Comets appeared in *December* and *March*	
The doleful Plague that followed them	
London was burnt, *September* 2, 3, 4, 5	
The laſt great Snow	
The wonderful Comet in *December*	
A Comet in *Auguſt*	
The terrible Fire in *Wapping*, *November* 19.	
A great Earthquake, *October* the 6th	
The laſt great Froſt	
The Rebellion in the *Weſt*	
The ſeven Biſhops ſent to the Tower, *June*	
The Prince of *Orange* Landed, *November* 5.	
King *William* went to *Ireland* with an Army, *June*	
The *French* Fleet beaten by the *Engliſh* and *Dutch*, &c.	
Our Moſt Gracious Queen *Mary* Dyed, *Dec.* 28.	
The Horrid Conſpiracy to Aſſaſſinate His Majeſty King *William*, and to bring in the *French*, was happily diſc.	
The Peace concluded with *France*	
War again proclaimed againſt *France*, &c.	

Of the Eclipſes this Year 1704.

FOur times this Year will the Luminaries appear Eclipſed to the Inhabitants of this Terraqueous Planet, twice the *Sun*, and twice the *Moon*; and only one of the *Moon* viſible here in *England*. They happen as followeth.

The firſt is an Eclipſe of the *Sun*, upon the 22th day of *May*, a little after Noon, but not viſible to *England*, nor to any part of *Europe*; but will appear about the Iſland of *St. Helena*, and to ſuch as ſail from thence to the *Cape of Good Hope*, and towards the *Antartick Circle*; alſo about the Iſlands *Trinidade*, *S. Maria de Agoſta*, and about the South-Eaſt parts of *Braſilia*.

The ſecond is an Eclipſe of the *Moon*, the 6th day of *June*, betwixt 6 and 7 in the Afternoon, and will not be viſible unto us, the *Moon* not being then riſen, about the end of the Eclipſe the *Moon* riſeth; but where it is viſible it will appear nearly total, but without continuance of total Darkneſs. It will appear to the Eaſtern parts of *Europe*, to all parts of *Aſia*, to the Eaſtern parts of *Africa*, in the *Eaſt-Indies*, &c.

The third Eclipſe is of the *Sun* the 16th day of *November*, a little after 5 in the morning, and therefore inviſible unto us, he *Sun* being not riſen; but will appear very great in ſeveral parts of *Aſia*, about *Mare de Sala*, or *Caſpian Sea*, in *Great Tararia*, alſo about *Nova Zembla*, the *Streights* called *Waggats*, or *Fretum Naſſovicum*, &c.

The fourth and only viſible Eclipſe is of the *Moon*, *November* he 30th, a little after 7 in the morning. The Calculation whereof followeth;

Middle time of the true ☍ at *London*, Nov. 29. at 19h. 16′. 34″.

	Sig.	deg.	′	″
Mean Anomaly of the *Sun*	5	12	40	05
Mean Anomaly of the *Moon*	9	27	33	05
Place of the *Sun* from the Earth	♐	19	23	00
Place of the M*oon* in her Orbit	♊	19	23	00
Place of the Node ſubtract	2	11	35	31
eſts Argument of Latitude		07	47	29
True Latitude of the *Moon*, North aſcending			40	37
eduction ſubſtract			01	45

			′	″
	Time of Reduction add		03	3
	Correct time of the ☍ *November* the 29th at	19 Hours	20	1
	Equation of Time add		06	0
	Apparent Time at *London*, the 29th day at	19 Hours	26	1
	Difference of Meridians ſubſtract		4	0
	Apparent Time at *Leiceſter*, the 29th day at	19 Hours	22	1
	Semidiameter of the *Moon*		14	4
	Semidiameter of the Earth's ſhadow		38	3
	Sum of the Semidiameters		53	2
	The *Moon*'s Latitude ſubſtract		40	3
	Reſts parts deficient		12	4
	Digits Eclipſed, are	5 digits	09	4
	Motion of half Duration		34	3
	Time of half Duration	1 Hour	11	2
	Interval of the ☍, and greateſt Obſcuration ſubſtract		07	1
Hence	The beginning of the Eclipſe is at	18 Hours	03	3
	The middle or greateſt Obſcuration at	19	14	5
	The end of the Eclipſe at	20	26	2

Moon's Latitude at the beginning,	North aſcending	37	2
Moon's Latitude at the end,		43	5

A Type of this Eclipſe, Nov. 30. *at 7 hours*, 14′. 56″. manè.

As to the Effects of Eclipſes. Of Eclipſes of the *Moon Aſtr* *logers* ſay, *In decem mediis gradibus* ♊, *Repentinos Exercitu* *motus, privatarum, publicarumq; rerum ſollicitationes; & in* ♊ *decem ultimis grad. præſtantis fama viri obitum oſtendit.*

Of the Four Quarters of the Year, and firſt of the Spring.

THe *Spring* Quarter begins this Year the 9th day of *March*, 52 min. after Noon, in the Meridian of *London*, making day and night of equal Length to all the Earth, (except under the *Poles*). Now as the *Days* and Nights are equal, ſo is there an equality in the temper of the Air, whereby the Pores of the Earth are relaxed, and the vegetable Life of Herbs and Plants is produced. This Quarter is generally hot and moiſt; and if it prove contrary, it bringeth Diſeaſes and dangerous Diſtempers. Such perſons as are naturally Melancholy, do enjoy their Healths the beſt this Quarter; the Sanguine the contrary. Such Diſeaſes as proceed from exceſs and putrefaction of Blood are moſt dangerous. In *March* be not too buſie in purging or bleeding, but rather bathe, and uſe ſuch meats and medicines as purge and ſweeten the blood. In *April* you may freely bleed bathe or purge, if there be occaſion. In *May* it is wholſome to drink Clarified Whey. Now Drink but little Wine; and forbear ſuch Meats as are of a hot Quality.

Of Summer.

SUmmer Quarter (according to Aſtronomical Calculation) begins this Year *June* 10. 58 min. after 1 in the Afternoon, the *Sun* then ſeeming to enter the Tropical Sign *Cancer*, (the Earth then entring *Capricorn*) maketh the longeſt Day and ſhorteſt Night to all the Inhabitants of this Northern Hemiſphere, This Quarter is naturally hot and dry; perſons of phlegmatick Conſtitutions are now beſt in Health, the Cholerick the contrary. Ancient people do now revive, but young people languiſh through exceſs of Blood, and are thereby much expoſed to Fevers, eſpecially the Tertian. In *June* abſtain from ſuch meats as ingender raw and moiſt humours. In *July* beware of bleeding or purging, and of eating ſuch meats as ingender Melancholy. In this and the next Month refrain immoderate Exerciſe and Venery, and drink not much Wine; for now it dryes the Stomach and Liver, and doth too much increaſe Choler.

Of Autumn.

THis Quarter begins this Year *September* 12. 39 min. after 3 in the morning, the *Sun* then entring *Libra*, or the *Earth*

Aries, doth again make equal Day and Night. This Quarter is naturally cold and dry, reſembling Melancholy. Young People are now lively. Perſons of moiſt and phlegmatick Conſtitutions are now beſt in Health, the Melancholy the contrary. In *September* eat moderately of all ſuch *Meats* and Fruits as your Stomach deſires. In this Month or the next you may bleed or purge if there be occaſion; but in *November* Melancholy increaſeth, and Blood decreaſeth. In this Quarter beware of taking Cold.

Of Winter.

WInter Quarter begins this Year *December* the 10th, 11 min. after 5 of the Clock at Night, in the Meridian of *London*; the *Sun* then ſeeming to enter *Capricorn*, as the *Earth* doth *Cancer*, maketh our ſhorteſt Day and longeſt Night. This Quarter is naturally cold and moiſt. Youth and cholerick perſons are now beſt in Health, but aged and phlegmatick perſons the contrary In *December* Melancholy and Phlegm do much increaſe. 'Tis not now good to bleed or purge. To drink Wine now and then, and to uſe Spices in your Diet is very good. The ſame obſerve in *January*. In *February* you may take Pills to purge the Head. Bathe or Bleed, if there be occaſion.

Further of the Tides, or Ebbing and Flowing of the Sea.

IN the former part, treating of the Tides, I propoſed to ſhew that the Motion of the Earth was the Cauſe thereof; and that it was by a compound motion of the Annual and Diurnal, that an unequal motion did ariſe, which was the prime Cauſe of Ebbing and Flowing, &c. The Earth, by the *Copernicans*, and ſuch as grant the motion thereof, is allowed theſe two motions: Firſt, The Annual, made in the grand Orb round the *Sun*, under the Ecliptick, from Weſt to Eaſt. Secondly, The Diurnal, made by the ſaid Globe, revolving about its own Centre, in 24 Hours. Now if theſe be rightly conſidered, it will be found that at all times one Hemiſphere of this Globe is volving the ſame way (in its Diurnal motion) with the Annual; and the other Hemiſphere is by the Diurnal motion, carryed contrary to the Annual; and all parts of the

Globe are thus ſucceſſively moved. To make this more plain, Take and conſider that part of the Globe which (at any time) is (in the grand Orb) the following part, and not ſo forward as the Centre, by near a ſemidiameter of the Globe; this ſame part in 12 hours, by the Diurnal motion, is become the leading or foremoſt part, and is more forward than the Centre, by near a ſemidiameter of the Globe; and on the contrary, that part of the Globe which was the foremoſt, and leading part in the grand Orb, is now become the following part; ſo that in 12 hours one part of the ſuperficies of this Globe hath moved more than the Centre, in the grand Orb, almoſt a Diameter of the Earth; and at, or in the ſame time, another part of the ſuperficies is not moved ſo far as the Centre by almoſt a diameter; and this alternately, in 12 hours more, that part which was by the Diurnal motion carryed on the ſame way with the Annual, is now carryed contrary to it; and that which was carryed contrary is now, that is, in the ſecond 12 hours, carryed the ſame way with it. From hence muſt follow a very conſiderable acceleration in that part, which by the Diurnal Motion is carryed the ſame way with the Annual; and as great a Retardation in the other part, which by the Diurnal is carryed contrary to the Annual: And all this variety of Motion happeneth in 24 hours, to the ſuperficies of this Globe, by the compound Motion of Circular or Annual, with the Central or Diurnal, 12 hours accelerating and 12 hours retarding: But in the middle of the 12 accelerating hours is the greateſt Acceleration, and in the middle of the 12 retarding hours the greateſt Retardation: All which is by means of the additions or ſubſtractions of the *Diurnal* Converſion from the Annual Circulation. Now this is the moſt potent and primary cauſe of the Ebbing and Flowing, without which no ſuch Effect would enſue. But becauſe the particular Accidents are many and various, that in ſeveral places and times are obſerved, which muſt have dependance on other different and concomitant Cauſes, though they have connexion with the primary, it will be convenient to conſider ſeveral Accidents that may be Cauſes of ſuch different Effects. And firſt, when ever the Water, by means of a notable Retardation or Acceleration of the motion of the Veſſel its container, ſhall have acquired a cauſe of running towards this or that extream, and ſhall be raiſed in one, and abated in the other, it will not continue for any time in that ſtate, when once the primary Cauſe is ceaſed; but by vertue of its own gravity, and inclination to grow level, it will return backwards of its own accord, and being grave and fluid, will not only move towards *Equilibrium*, but by its own *Impetus*, will go beyond it, riſing in the part which before was loweſt; nor will it ſtay there, but returning backwards a-new with reiterated reciprocations of its undulations will ſhew us, that it will not from a velocity of Motion once acquired, reduce it ſelf on a ſudden to reſt; but this Motion muſt abate by degrees, as is obſerved in the vibration of *Pendulums*, when the primary cauſe of their Motion ceaſeth. Another Accident is the different Lengths of the Veſſels, *viz.* the Seas, for in ſhorter Veſſels the reciprocations are more frequent, as is ſeen in the different vibrations alſo of Pendulums of different lengths. The different Depths of the Seas is alſo another cauſe of the undulations of the Waters being made in longer or ſhorter times. And it is worth obſerving, how the Waters riſe and fall alternately towards the extreams of the Veſſels, and how they only run and move forwards and backwards in the middle, and how ſucceſſively thoſe that are neareſt to the extreams riſe and fall proportionally more than the remote; and how well this agrees with the Fluctuation of the Waters, cauſed by the motion of the Veſſels containing them, as is ſhewn in the former part in *September* and *October*; and alſo how diſagreeable it is to that motion which muſt be cauſed, if the *Moon's* attracting the Waters was the cauſe of Tides. And as to the time of the returns of theſe Ebbings and Flowings, though it may ſeem that it ſhould be but every 12 hours, that is, once by the greateſt velocity, and once by the greateſt tardity of motion, yet that they appear to be in little more than every 6 hours; this determination cannot be taken from the primary Cauſe only, but here the ſecondary Cauſes have their ſhare in timing of them, as the greater or leſs length of the Veſſels, and the greater or leſs depth of them alſo: For although theſe Cauſes have not any operation in the motion of the Waters, thoſe operations belonging to the ſole primary cauſe, without which no Ebbing or Flowing would happen, yet theſe have a principal ſhare in determining the times or periods of their Reciprocations, and herein they are ſo powerful, that the primary Cauſe muſt give way to them ; The period of 6 hours therefore is no more proper or natural than thoſe of other intervals of time, though indeed it is in ſome places moſt obſerved ; for in other places there are much ſhorter periods, and in other places great diverſity, from the Cauſes afore-mentioned. Much more may be ſaid of theſe Accidents, for which here is not room : As ſome Seas having little or no Tides obſervable, others extraordinary Tides, theſe differences in a great meaſure ariſe from the different largeneſs of the Seas, and their different extenſion ; for thoſe that are extended in length from Eaſt to Weſt, have greater Currents, and fluctuate much more than thoſe that are extended from North to South ; theſe latter not being ſo apt to receive ſuch motion of the Waters as the former. But here ſtill remains other Alterations in the Tides, not as yet accounted for, and which bring both the *Sun* and *Moon* ſeemingly to have their ſhare therein, and in which the *Moon* indeed is much concerned, not as a prime mover of the Waters by attraction, or otherwiſe, but as an augmenter or diminiſher of their motion. Theſe different Ebbings and Flowings that are obſerved Monthly and Annually, which are called Spring-Tides, and Neap-Tides, Equinoctial and Solſtice, theſe are all cauſed by the different additions and ſubſtractions to and from the Annual Motion, cauſed by the motion of the *Moon* and *Earth* : For if theſe additions and ſubſtractions ſhould always be in the ſame proportion in reſpect of the Annual Motion, the cauſe of the Ebbing and Flowing would indeed continue, but ſo that they would perpetually return in the ſelf-ſame manner. But that theſe additions and ſubſtractions do vary, is manifeſt, and that ſeveral ways : For firſt, the Earth in her Annual Courſe moveth ſometimes more ſwift, ſometimes more ſlow ; *viz.* more ſwift when in *Perihelion*, more ſlow in *Aphelion*, which is allowed by the Calculations of all *Aſtronomers* ; ſo that were the additions or ſubſtractions cauſed by the Diurnal Converſions always the ſame, yet here will ariſe a proportional alteration cauſed by theſe being added to, or ſubſtracted from a ſwifter or ſlower motion : But theſe Diurnal Additions and Subſtractions do alſo vary ; for in the Solſtices, that is, when the *Sun* is in ♋ or ♑, they are (in the Equator), or whole Diameter of the Earth, and in all other parts of the Earth a Diameter of the reſpective parallels: But in the Equinoxes, by reaſon of the Angle made by the Eclipick and Equinoctial, theſe Diurnal Additions and Subſtractions are leſs, that is, in the Equator where greateſt, not a Diameter of the Earth by near a twelfth part; and in other parallels they leſſen according as their Diameters diminiſh: Then the *Aphelion* and *Perihelion* of the Earth being near the Solſtices, that is, in the beginning of ♋ and ♑ it happens, that the greateſt Additions and Subſtractions meet with the Annual Motion, ſometimes when it is ſwifteſt, and ſometimes when it is ſloweſt, and thereby make the greater Alterations by augmenting or diminiſhing the Tides: From all which ariſes the difference betwixt the Solſticial and Equinoctial Ebbings and Flowings. Now the Monthly Alterations that are found in the Tides, which are obſerved to differ very much in their Ebbings and Flowings, and are called Spring-Tides, and Neap Tides; theſe are altered by the *Moon*; not by her attracting the Waters, but by her accelerating or retarding the Earth's motion in the Grand Orb: For did ſhe perform this by attraction, we ſhould indeed expect extraordinary Tides at the *New Moon*, when the *Sun* and ſhe joyn Forces; (for I ſee not but that the *Sun* may attract as much as the *Moon*). But what Tides then muſt we have at the *Full Moon*, when the *Sun* draweth one way, and the *Moon* another? Here we muſt expect little or no Tides, no Ebbing or Flowing at all, according to this attractive ſuppoſition: But theſe Tides are ſometimes found as great as at the *New Moon*. Now that the *Moon* doth ſometimes accelerate, and ſometimes retard the Earth in her motion in the Grand Orb, there is a ſeeming neceſſity. The Earth in the Grand Orb, moveth as a Circular Pendulum; and this Pendulum being lengthened or ſhortened, cauſeth the Earth to move ſlower or faſter, as appears by her different motions, when in *Aphelion*, and when in *Perihelion*. And did the Earth thus move alone through the Grand Orb, we might poſſibly expect no other inequality in her motion, but what muſt ariſe from hence: But the Earth carryeth along with her, in this her motion, that Attendant or Appendant of hers the *Moon*, which is as an additional weight, ſo applyed to this long Pendulum, as ſometimes to accelerate, and ſometimes to retard the motion thereof: And though this hath not hitherto been accounted for by *Aſtronomers*, yet that of neceſſity it muſt be ſo, ſeems not much to be doubted. For though the *Moon* in the Quarters be not much more diſtant from the *Sun* than the *Earth* is, and may then ſwing with the *Earth* in the Grand Orb, without accelerating or retarding her motion, yet when ſhe is to us in the Full, ſhe is then a ſemidiameter of her Orb, farther from the *Sun* than the *Earth* is; hereby this long Pendulum is lengthened, and the motion of the Earth retarded: But at the *New Moon*, ſhe is then a ſemidiameter of her Orb nearer to the *Sun* than the Earth is; then is this Pendulum ſhortened, and thereby the motion of the Earth accelerated; and though this appendant weight the *Moon*, may not be above a 50th or 51th part of the whole weight of this great Pendulum, yet being placed ſometimes a ſemidiameter of her Orb nearer to the *Sun*, and other times a ſemidiameter farther of, muſt cauſe a conſiderable acceleration one while, and retardation another while, in the Earths Annual Motion; and this happening Monthly, *viz.* an acceleration at the New Moon, and retardation at the Full, is the cauſe of thoſe Spring-Tides which then happen. Now by all that hath been ſaid it may appear, That the *Moon* is no more the prime Cauſe of Ebbing and Flowing of the Waters, than the Pendulum or Ballance is of the prime motion of a Clock or Watch: This firſt motion in the Clock or Watch is given, and continued by the Weight or Spring, the Pendulum or Ballance do regulate this Motion by their Vibrations, ſo as the ſeveral Wheels may be brought about in their proper and deſigned Time: So is it with the Waters in the Seas, their Fluctuations, or Ebbings and Flowings, are firſt ſet forward by the compound Motion of the Earth, made of the Annual and Diurnal; the different Additions and Subſtractions made by the Diurnal Converſions, at different Times of the Year are the Cauſe of the Solſticial and Equinoctial different Alterations; and the *Moon*'s Monthly accelerating and retarding the Earth in her Annual Motion in the Grand Orb, is the Cauſe of the different Ebbings and Flowings of the Spring and Neap-Tides. 'Tis poſſible alſo that the New and Full Moons which happen near the Apogæon and Perigæon of the

Moon

Moons, may alter the Tides more or leſs than other Full or New Moons.

There are many other Accidents which in different places may and do very much alter the Tide, which cannot in this little room be conſidered ; ſuch as are made by the great and uncertain Winds in ſome places, whilſt other places have a conſtant and certain Wind ; ſome Seas receive a much larger quantity of Water by the Rivers that run into them, than others do, in proportion to the greatneſs of them ; ſome Seas again do by Vapour ſend away much more Water than others, and of the Vapour thus ſent, ſome Seas do receive a greater quantity back again than others, *&c* From which ariſeth different Currents in Streights, where the Seas do as it were empty and ſupply each other. But of this, for want of room, no more at preſent.

To find the Riſing, Southing and Setting, of ſeveral fixed Stars hereafter mentioned.

IN the Tables following you have firſt the ſeven Stars Southing for every fifth day : in the ſecond Table is ſet the difference betwixt the Southing of thoſe Stars therein mentioned, and the ſeven Stars, which being added to the time of the ſeven Stars Southing, giveth their Southing. In the ſame Table is alſo ſet their ſemidiurnal Arches, thereby to find their riſing and ſetting. Suppoſe it was required to find what time the great Dog-ſtar, called *Sirius*, will be South the 11th of *February* ? I then find the Seven Stars South at 5 ho. 8 min. to which I add 3 ho. 2 m. the difference annexed to the great Dog-Star, and it makes 8 ho. 10 min. being the time of its Southing the ſaid 11th. day of *February*. If to the Southing you add the Semidiurnal Arch 4 ho. 31 min. it gives the time of its ſetting at 12 ho. 41 min. but if you ſubſtract the Semidiurnal Arch from the Southing, it leaves the time of its Riſing at 3 ho 29 min. in the Afternoon. The like may be done by any other of the ſaid Stars.

A Table ſhewing the Hour and minute of the Seven Stars coming to South, every 5th day of this year, 1704.

Moneths	Dayes of the Moneth: 1 H.	M.	6 H:	M.	11 H.	M.	16 H.	M.	21 H.	M.	26 H.	M.
January	7 A	55	7 A	34	7 A	12	6 A	51	6 A	30	6 A	10
February	5 A	47	5	27	5	8	4	49	4	30	4	12
March	3 A	57	3	38	3	20	3	1	2	43	2	25
April	2 A	4	1	45	1	27	1	7	0	49	0	29
May	0 A	11	11 M	51	11 M	31	11 M	11	10 M	50	10 M	20
June	10 M	5	9	44	9	23	9	3	8	42	8	22
July	8 M	2	7	42	7	21	7	1	6	42	6	22
Auguſt	6 M	0	5	42	5	23	5	5	4	46	4	28
September	4 M	7	3	49	3	31	3	14	2	57	2	38
October	2 M	19	2	0	1	41	1	22	1	2	0	43
November	0 M	19	11 A	59	11 A	36	11 A	13	10 A	51	10	29
December	10 A	11	9	46	9	23	9	1	8	38	8	17

A Table ſhewing the difference in hours and minutes between the coming to ſouth of ſeveral fixed ſtars, and the ſeven ſtars, as alſo their ſemi-diurnal Arches thereby to find their riſing and ſetting.

Names of the Stars.	*Diffe. ſouth.* *h.*	*m.*	*ſemid. Arches* *h.*	*m.*	*Names of the Stars.*	*Diff. ſouth.* *h.*	*m.*	*ſemid. Arches* *h.*	*m.*
Aldebaran B.eye	0	49	7	28	Lions heart, Baſil.	6	23	7	13
2d.in Orions Girdle	1	51	5	54	Virgins Spike	9	40	5	9
Gr. Dog. Syrius	3	2	4	31	Arcturus	10	32	8	0
Caſtor 1ſt.head II	3	46	9	47	South ballance	11	5	4	40
Lit.Dog.Procyon	3	54	6	32	North ballance	11	31	5	16
Pollux,2d.head II	3	57	9	4	Northern Crown	11	52	8	55
Northern Aſſ.	4	56	8	12	bright ✳ Lyræ	14	57	*ſets*	*not*
Southern Aſſ.	4	58	7	49	bright ✳ Vulturis	16	6	6	43

For the better diſtinction of the ſeveral ſizes of Stars they are divided into ſix ſeveral magnitudes, The biggeſt and brighteſt Stars are called Stars of the firſt Magnitude. Thoſe one ſize inferiour in light,and bigneſs are called Stars of the ſecond Magnitude, *&c.* Now for the better knowing the Stars before-mentioned, Note, that the great Dog-ſtar, Lions Heart, Virgins Spike, and the bright ſtar of *Lyra*, are accounted ſtars of the firſt magnitude, ſo are alſo *Aldebaran* and *Arcturus*,but they are Red ſtars,much of the colour of *Mars*, all the reſt in the Table are of the ſecond magnitude, except the Northern and Southern *Aſſ*, which are ſmall Stars being of the fourth magnitude.

For the Meaſuring of Timber.

HEre followeth Tables ready calculated for the Meaſuring of Squared or Round Timber, which is ſuppoſed to be equal all along: Their uſe is thus,ſeek the ſide of the Squared, or compaſs of the Round Timber, in the firſt, third or fifth columns of the Tables, and againſt it, in the next column you have the length of a ſolid foot. Thus, the ſide of a ſquared piece of Timber being 20 inches, the length of a ſolid foot will be 4 inches, and 3 tenth parts of an inch: And the compaſs of a round piece, being 80 inches the length of a ſolid foot will be found to be 3 inches, and 39 hundredth parts of an Inch.

A Table, ſhewing how much in length will make a Solid foot, of any Square Stone or Timber: The ſide of the Square being given in inches, from one inch to 36 inches ſquare.

Side of the Square.	Length of a ſolid foot.			Side of the Square.	Length of a ſolid foot.		Side of the Square.	Length of a ſolid foot.	
Inch.	Fe.	Inc.	10ths	Inch.	Inc.	10th.	Inch.	Inc.	10th.
1	144	0	0	13	10	2	25	2	8
2	36	0	0	14	8	8	26	2	6
3	16	0	0	15	7	6	27	2	3
4	9	0	0	16	6	7	28	2	2
5	5	9	2	17	5	9	29	2	1
6	4	0	0	18	5	3	30	1	9
7	2	11	2	19	4	8	31	1	8
8	2	3	0	20	4	3	32	1	7
9	1	9	3	21	3	9	33	1	6
10	1	5	3	22	3	5	34	1	5
11	1	2	3	23	3	3	35	1	4
12	1	0	0	24	3	0	36	1	2

A Table ſhewing how many inches in length will make a foot ſolid, of any round piece of Timber or Stone, the Girt being known, from 12 inches compaſs to 100.

Com.	len. of a foot		Com.	len. of a foot		Com.	len. of a foot	
Inch.	Inch.	100 p.	Inch.	Inch.	100 p.	Inch.	Inch.	100 p.
11	179	46	41	12	92	71	4	31
12	150	80	42	12	31	72	4	20
13	128	49	43	11	74	73	4	08
14	110	79	44	11	31	74	3	97
15	94	31	45	10	72	75	3	86
16	84	82	46	10	26	76	3	76
17	75	14	47	9	83	77	3	66
18	67	02	48	9	42	78	3	57
19	60	15	49	9	04	79	3	48
20	54	29	50	8	69	80	3	39
21	49	23	51	8	35	81	3	31
22	44	86	52	8	03	82	3	23
23	40	90	53	7	73	83	3	15
24	37	69	54	7	42	84	3	08
25	34	74	55	7	18	85	3	01
26	32	12	56	6	92	86	2	94
27	29	79	57	6	68	87	2	87
28	27	70	58	6	45	88	2	80
29	25	82	59	6	24	89	2	74
30	24	13	60	6	03	90	2	68
31	22	60	61	5	84	91	2	62
32	21	21	62	5	65	92	2	57
33	19	92	63	5	47	93	2	51
34	18	78	64	5	30	94	2	46
35	17	74	65	5	14	95	2	41
36	16	76	66	4	98	96	2	36
37	15	86	67	4	84	97	2	31
38	15	04	68	4	70	98	2	26
39	14	28	69	4	56	99	2	22
40	13	57	70	4	43	100	2	17

Advertiſements.

WRiting and *Arithmetick* Taught by Mr. *Joſeph Pepper*, at *Stamford* in *Lincolnſhire*: With whom Youth may be commendably Boarded for their ſpeedier Improvement.

Bateman's true Spirits of *Scurvy-Graſs*, Plain and Golden (ſo long famous for the Cure of the *Scurvy*, *Gout*, *Dropſie*, and ſeveral other Cronical Diſtempers) are, ſince the Death of Mr. *John Hooker*, rightly Prepared only by Me *Stephen Terry*, at the Original Houſe in *Paul's Chain* near *Doctors-Commons.* Price One Shilling the Bottle; with Incouragement to thoſe that ſhall ſell them again.

The Grand *Balſamick Pills*, prepared chiefly for the Diſeaſes of the Head and Stomach, are made and ſold only by *Stephen Terry*, at his Houſe in *Paul's Chain*, ſealed up in Tin Boxes: Price One Shilling the Box.

IF any Gentleman or other Perſon would have his Land ſurveyed, or any Building or Edifice meaſured, either for Bricklayers, Carpenters, Maſons, Plaiſterers, &c. The Author of this Almanack will perform the ſame, either for Maſter or Workmen: And if any Perſon would have about his Houſe or Garden, any Sun-Dyals, either Direct, Declining, Inclining, Reclining, Concave, Convex or Reflective, He will make or prepare for them ſuch as they ſhall deſire.

From Leeſthorp *near* Melton-Mowbry, *in the*
County of Leiceſter, Aug. 30. 1703.